



HC 387

DRUGS AND PHARMACEUTICALS CURRENT HIGHLIGHTS (R & D)

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R81A001. Asymmetrical ovarian function during recruitment and selection of the dominant follicle in the menstrual cycle of the rhesus monkey.

G. S. Dizerega, E. L. Marut, C. K. Turner & G. D. Hodgen

NICHHD, Pregnancy Research Branch, Building 18, Room 101, Bethesda, MD, 20205, USA.

J. of Clinical Endocrinology and Metabolism, **51**, 698 (Oct. 80)

R81A002. Immunoreactivity of women on hormonal contraceptives, phytohemagglutinin and concanavalin—An induced lymphocyte response.

G. Gerretsen & others

Leyenburg Hospital, The Hague, Netherlands.

Contraception, **22**, 25 (July 80)

R81A003. Insulin induced insulin resistance of lipolysis in human adipocytes in organ culture.

J. Stevens, R. L. Atkinson & S. L. Pohl

University of Virginia, School of Medicine, Dept. Internal Medicine, Charlottesville, VA, 22908, USA.

J. of Clinical Endocrinology and Metabolism, **51**, 921 (Oct. 80)

R81A004. Insulin receptors in circulating erythrocytes and monocytes from women on oral contraceptives or pregnant women near term.

J. C. M. Tsibris & others

University of Illinois, Abraham Lincoln School of Medicine, Dept. Obstetrics & Gynecology, Chicago, IL, 60612, USA.

J. of Clinical Endocrinology and Metabolism, **51**, 711 (Oct. 80)

R81A005. Luteinizing hormone releasing factor in pituitary stalk plasma from long-term ovariectomized rats—Effects of steroids.

D. K. Sarkar & G. Fink

University of Oxford, Dept. Human Anatomy, Oxford OX1 3QX, England.

J. of Endocrinology, **86**, 511 (Sep. 80)

R81A006. Polypeptide Hormones. Miles International Symposium, Series No. 12, Edited by R. F. Beers & E. G. Bassett; Raven Press (New York).

R81A007. Role of adrenaline and cyclic AMP in appearance of tyrosine aminotransferase in perinatal liver.

A. V. Ghisalberti & others

University of Western Australia, Dept. Biochemistry, Nedlands, WA 6009, Australia.

Biochemical J., **190**, 685 (15 Sep. 80)

R81B003. Amantadine reduces haloperidol-induced dopamine receptor hypersensitivity in striatum.

R. M. Allen, J. D. Lane & J. T. Braun

Louisiana State University, Medical Centre, Dept. Psychiatry, Psychiatric Research Unit, Shreveport, LA. 71103, USA.

European J. of Pharmacology, **65**, 305 (25 July 80)

B. Nervous System

R81B001. Is the action of peptide hormones of gastrointestinal origin on the hypothalamic satiety center modulated by rem sleep dependent release of their central nervous system analogues?

E. Elomaa

University of Helsinki, Dept. Physiology, SF-00170 Helsinki 17, Finland.

Medical Hypotheses, **6**, 967 (Sep. 80)

R81B002. Aging alters amphetamine-induced stereotyped gnawing and neostriatal elimination of amphetamine in mice.

P. Hicks, R. Strong, J. C. Schoolar & T. Samorejski

Texas Research Institute, Mental Science, Texas Medical Centre, 1300 Mourshead Avenue, Houston, TX, 77030, USA.

Life Sciences, **27**, 715 (1 Sep. 80)

R81B004. Analgesic and other pharmacological activities of a new narcotic antagonist analgesic (—) (3-methyl-2-butenyl)-4-[2-(3-hydroxyphenyl)-1-Phenylethyl]-piperazine and its enantiomers in experimental animals.

H. Nakamura, K. Ishii, Y. Yokoyama, S. Motoyoshi, K. Natsuka & M. Shimizu*

Dainippon Pharmaceutical Company Limited, Research Laboratories, Suita, Osaka 564, Japan.

J. of Pharmacy and Pharmacology, **32**, 635 (Sep. 80)

R81B005. Analgesics, endorphins and the opiate receptor.

R. J. Kobylecki & B. A. Morgan

Reckitt & Colman Limited, Div. Pharmaceuticals, Hull HU8 7DS, North Humbershire, England.

Annual Report in Medicinal Chemistry, **15**, 22 (1980)

R81B006. Angiotensin II inhibits both heat production and heat loss mechanisms in the rat.

M. T. Lin, A. Chandra & J. J. Jou

National Defence Medical Centre, Dept. Physiology & Biophysics, Taipei, Taiwan.

Canadian J. of Physiology and Pharmacology, **58**, 909 (Aug. 80)

R81B007. Anticonvulsant effects of caerulein and cholecystokinin octapeptide, compared with those of diazepam.

G. Zetler

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European J. of Pharmacology, **65**, 297 (25 July 80)

R81B008. Antidepressant drug action and presynaptic α -receptors.

M. G. Collis & J. T. Shepherd

ICI Limited, Dept. Biology, College of Pharmaceutics, Alderley Park, Cheshire, England.

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Dainippon, Pharmaceutical Company Limited, Research Laboratory, Enokicho, Suita, Osaka 564, Japan.

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R. M. Pinder

Organon Science Development Group, Oss, Netherlands.

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Merck Sharp & Dohme, Research Laboratories, West Point, PA, 19486, USA

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B. C. White & others

Centre College Kentucky, Dept. Psychology, Danville, KY, 40422, USA.

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H. A. Robertson

Dalhousie University, Faculty of Medicine, Dept. Pharmacology, Halifax, NS, Canada B3H 4H7.

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R. J. Katz

University of Michigan, Medical Centre, Mental Health Research Institute, Dept. Psychiatry, Ann Arbor, MI, 48109, USA.

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M. Gavish & S. H. Snyder *

Johns Hopkins University, School of Medicine, Dept. Neuroscience, Baltimore, MD, 21205, USA.

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L. F. Tseng, E. T. Wei, H. H. Loh & C. H. Li

Medical College of Wisconsin, Dept. Pharmacology & Toxicology, Milwaukee, WI, 53226, USA.

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M. L. Mayer & D. W. Straughan

School of Pharmacy London, Dept. Pharmacology, 2939 Brunswick Square, London WC1N 1AX, England.

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A. C. C. Bentall & L. J. Herberg *

Institute of Neurology, Experimental Psychology Laboratory, London WC1E 3BG, England.

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T. J. Teyler

Northeastern Ohio University, College of Medicine, Program Neurobiology, Rootstown, OH, 44272, USA.

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G. I. Hatton, A. D. Doran, A. K. Salm & C. D. Tweedle

Michigan State University, Program Neuroscience, East Lansing, MI, 48824, USA.

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D. Romer & others

Sandoz Limited, Preclinical Research Dept., CH-4002 Basel, Switzerland.

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Faculty of Medicine Paris Sud, Pharmacology Laboratory, 15 Rue Ecole Medicale, F-75270 Paris 06, France.

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H. Hall, M. Sallemark S. B. Ross

Astra Lakemedel AB, Research & Development, Research Laboratories, S-15185 Sodertalje, Sweden.

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B. Saxena, A. N. Singh, & W. R. Porter
POB 585, Hamilton, Ontario, Canada.

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H. J. Haase

Pfalzsklin Landeck, weinstr 100, D-6749 Klingenmunster 2, Federal Republic of Germany.

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J. B. Harris

New castle General Hospital, Newcastle Tyne NE4 6BE, Tyne & Wear, England.

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T. Shiraishi & M. Mager

Tokai University, School of Medicine, Dept. Physiology, Isehara, Kanagawa 25911, Japan.

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J. A. Bell, L. G. Sharpe & J. N. Berry

NIDA, Addict Research Centre, Div. Research; Lexington, Ky, 40583, USA.

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J. P. Fry, W. Zieglgönsberger* & A. H.

Max Planck Institute of Psychiatry, Dept. Neuropharmacology, Kraepelin 2, D-8000 Munich 40, Federal Republic of Germany.

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G. Jancso, E. Kiraly & A. Jancso-Gabor

Attila Jozsef University, School of Medicine, Dept. Anatomy H-6701 Szeged Hungary.

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B. Costall, R. J. Naylor & V. Rohria

University of Bradford, Postgraduate School of Studies in Pharmacology, Bradford BD71DP, West Yorkshire, England.

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C. V. Gisolfi, F. Mora & P. T. Wall

University of Iowa, Dept. Physiology & Biophysics, Iowa City, IA, 52242, USA.

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S. Azmatullah & I. D. Morris

University of Manchester, Dept. Pharmacological Material Medicine & Therapeutics, Manchester M13 9PT, Lancashire, England.

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M. Suga

Niigata University, Brain Research Institute, Dept. Neurology, Asahi, Niigata 951, Japan.

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J. G. Sinclair, R. E. Fox, S. S. Mokha* & A. Iggo

University of Edinburgh, Dept. Veterinary Physiology, Somatosensory Research Group, Edinburgh EH9 1QH, Midlothian, Scotland.

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University of Manchester, School of Medicine, Dept. Pharmacy, Material Medicine & Therapeutics, Manchester M13 9PT, Lancashire, England.

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K. Inokuchi

Hirosaki University, School of Medicine, Dept. Pharmacology, Hirosaki, Aomori 036, Japan.

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C. V. Gisolfi & others

University of Iowa, Dept. Physiology & Biophysics, Iowa City, IA, 52242, USA.

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A. Nicoullon & N. Dusticier

CNRS, Institute of National Polytechnic,
Dept. Neurophysiology General, 31
Chemin Joseph Aiguier, F-13274 Mar-
seille 02, France.

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N. Iwata & others

Sankyo Company Limited, Central
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Biological Research Laboratories, 87,
Senneville, Quebec, Canada H9X 3R3.

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F. E. Chen & M. T. Lin*

National Defense Medicine Center, I
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Cornell University, Dept. Poultry Scien
Ithaca, NY, 14853, USA.

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National Defence Medical Centre, Dep
Physiology & Biophysics, Tapei, Taiwa

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M. Arluison & others

University of Paris 6, Academy of Paris
Cytology Laboratory, F-75230 Paris 05,
France.

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D. Mitolo-chieppa & M. R. Carratu

University of Bari, Institute of Pharmacology, I-70124 Bari, Italy.

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University of California Los Angeles, School of Medicine, Dept. Pharmacology, Los Angeles, CA, 90024, USA.

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R. B. Carter & J. D. Leander

University of North Carolina, School of Medicine, Dept. Pharmacology, Chapel Hill, NC, 27514, USA.

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O. Colboc & J. Costentin*

Uer Medicine & Pharmacy, Pharmacodynamics & Physiology Laboratory, 49 Rue Maulevrier, F-76000 Rouen, France.

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H. Lal & others

University of Rhode Island, Dept. Pharmacology & Toxicology, Kingston, RI, 02881, USA.

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K. Morita, R. A. North & Y. Katayama

Loyola University, Stritch School of Medicine, Dept. Pharmacology Neurophysiology Laboratories, Maywood, IL, 60153, USA.

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Y. F. Jacquet

Rockland Research Institute, Centre Neurochemistry, New York, NY, 10035, USA.

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B. R. Sastry

University of British Columbia, Faculty of Medicine, Dept. Pharmacology, Vancouver, BC, Canada V6T 1W5.

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University of California San Diego, School of Medicine, Dept. Psychiatry, LA Jolla, CA, 92092, USA.

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E. Muscholl

University of Mainz, Dept. Pharmacology, D-6500 Mainz, Federal Republic of Germany.

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Y. Nomura

Hiroshima University, School of Medicine, Institute of Pharmaceutical Sciences, Dept. Pharmacology, Hiroshima 734, Japan.

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G. Di Chiara

University of Cagliari, Institute of Pharmacology I-09100 Cagliari, Italy.

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S. J. Enna

University of Texas, School of Medicine, Dept. Pharmacology, Houston, 77025, USA.

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L. Maitre & R. Zimmer

Ciba Geigy AG, Div. Pharmaceuticals, Dept. Research, CH-4002 Basel, Switzerland.

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Hiroshima University, School of Medicine, Institute of Pharmaceutical Sciences, Dept. Pharmacology, Hiroshima 734, Japan.

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T. Shiraishi & M. Mager

Tokai University, School of Medicine, Dept. Physiology, Isehara, Kanagawa 25911, Japan.

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A. Pile & J. Z. Nowak

Polish Academy of Science, Institute of Pharmacology, 12, Smetna Strasse, PL-31343 Krakow, Poland.

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S. Saarela, R. Hissa & K. Kippo

University of Oulu, Dept. Zoology, Zoophysiology Laboratory, SF-90220 Oulu 22, Finland.

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J. Meites

Michigan State University, Dept. Physiology, Neuroendocrine Research Laboratory, East Lansing, MI, 48824, USA.

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M. T. Lin & others

National Defence Medical Centre, Dept. Physiology & Biophysics, Taipei, Taiwan.

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R. D. M. Jones & J. G. Jones

Northwick Park Hospital, Div. Anaesthesia, Harrow HA1 3UJ, Middlesex, England.

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A. Phillippu

University of Wurzburg, Institute of Pharmacology & Toksikology, D-8700 Wurzburg, Federal Republic of Germany.

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G. R. Broun, V. I. Govardovskii & G. G. Zhadan

IP Pavlov Physiology Institute, Leningrad, USSR.

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I. E. Dreost†

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University of Wales, Welsh National School of Medicine, Dept. Pharmacology, Cardiff CF4 4XX, Glamorgan, Wales.

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G. Head & P. I. Korner*

Baker Medical Research Institute, Commercial Road, Prahran, Victoria 3181, Australia.

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M. J. W. Brennan, R. C. Cantrill & B. A. Wylie

University of Witwatersrand, School of Pathology, Dept. Medical Biochemistry, Johannesburg 2001, South Africa.

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T. S. Farris & G. E. Richards

University of Texas, School of Medicine, Dept. Pediatrics, Houston, TX, 77030, USA.

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A. R. Cools & J. M. Van Rossum

University of Nijmegen, Dept. Pharmacology, NL-6500 HB Nijmegen, Netherlands.

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N. S. Buckholtz

Medical University of South Carolina,
Dept. Psychiatry, Charleston, SC, 29403,
USA.

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S. Agoston & others

State University of Groningen, Institute
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R. W. Olsen, T. D. Reisine & H. I. Yamamura

University of California Riverside, Dept.
Biochemistry, Div. Biomedical Sciences,
Riverside, CA, 92521, USA.

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R. J. Lefkowitz & B. B. Hoffman

Duke University, Medical Centre, Dept.
Medicine Cardiovascular, Howard
Hughes Medicine Research Laboratory,
Durham, NC, 27710, USA.

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O. G. Berge, K. Hole & H. Dahle

University of Bergen, Institute of Physiology, N-5014 Bergen, Norway.

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H. J. L. M. Wijnen, E. R. De Kloet,
D. H. G. Versteeg & W. De Jong

State University of Utrecht, Faculty of
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Pharmacology, Utrecht, Netherlands.

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J. W. Maas & Y. Huang

Yale University, School of Medicine,
Dept. Psychiatry, New Haven, CT,
06516, USA.

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Washington University, Dept. Physiology & Biophysics, St. Louis, Mo, 63110, USA.

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A. D. Korezyn

Tel Aviv University, Sackler School of Medicine, Maurice & Gabriella Goldschleger Eye Institute, Ramat Aviv, Israel.

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H. Y. T. Yang, T. Hexum & E. Costa

St Elizabeths Hospital, NIMH, Preclinical Pharmacology Laboratory, Washington, DC, 20032, USA.

Life Sciences, **27**, 1119 (29 Sep. 80)

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W. S. Young III & others

Johns Hopkins University, School of Medicine, Dept. Neuroscience, Baltimore, MD, 21205, USA.

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R. B. McCall & G. K. Aghajanian

Upjohn Company, Cardiovascular Research, Unit 72432093, Kalamazoo, MI, 49001, USA.

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W. C. Koller & others

Rush Presbyterian St. Lukes Medical Centre, Dept. Neurological Science, 1735 West Harrison, Chicago, IL, 60612, USA.

Neuropharmacology, **19**, 831 (Sep. 80)

R81B096. Pharmacological modulation of cholinergic neurotransmission in guinea pig trachea *in vitro*.

T. R. Jones, J.T. Hamilton & N. M. Leach

University of Western Ontario, Dept. Pharmacology, London, Ontario, Canada N6A 3C1.

Canadian J. of Physiology and Pharmacology, **58**, 810 (July 80)

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M.D.T. Tuong, M. Garbarg & J.C. Schwartz

INSERM, Centre Paul Broca, Neurobiology Unite 109, 2 Rue Alesia, F-75014 Paris, France.

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J. G. Rafanell, L. Belles, & J. Forn*

Uriach & Cia Sa, Centre of Research, Dept. Pharmacology, Decano Bahi 59-67, Barcelona 26, Spain.

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N. Murakami & Y. Sakata

Yamaguchi University, School of Medicine, Dept. Physiology, Ube, Yamaguchi 755, Japan.

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R. A. Levy

University of Illinois, College of Morphology, Dept. Pharmacology, Chicago, IL, 60680, USA.

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(Editorial)

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I. Hindmarch

University of Leeds, Dept. Psychology, Leeds LS2 9JT, West Yorkshire, England.

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J. P. Huidobro-Toro & E. L. Way

NYU, Bellevue Medical Centre, Dept. Pharmacology, New York, NY, 10016, USA.

European J. of Pharmacology, **65**, 221 (25 July 80)

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A. C. Sullivan

Hoffmann La Roche Incorporated, Nutley, NJ, 07110, USA.

Annual Reports in Medicinal Chemistry, **15**, 172 (1980)

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S. Garattini

Mario Negri Institute of Pharmacological Research, Via Eritrea 62, I-20157 Milan, Italy.

Trends in Pharmacological Sciences, **1**, 354 (Sep. 80)

R81B106. Reduction by β -endorphin of efflux of dopamine and DOPAC superfused medial basal hypothalamus.

M. M. Wilkes & S. S. C. Yen

University of California San Diego, School of Medicine, Dept. Reproductive Medicine, La Jolla, CA, 92093, USA.

Life Sciences, **27**, 1387 (13 Oct. 80)

R81B107. Regional distribution of cholinergic muscarinic receptors in spinal cord.

S. O. Kayaalp & H. N. Neff

Saint Elizabeths Hospital, NIMH, Pre-clinical Pharmacology Laboratory, Washington, DC, 20032, USA.

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R81B109. Role of brain catecholamines and 5-hydroxytryptamine in morphine induced temperature changes in normal and tolerant rats and mice.

P. Slater & C. Blundell

University of Manchester, School of Medicine, Dept. Physiology, Manchester M13 9PT, Lancashire, England.

Archives of Pharmacology, **313**, 125 (Aug. 80)

R81B110. Role of brain dopaminergic mechanisms in rodent aggressive behaviour: Influence of (+)- α -n-propyl-norapomorphine on three experimental models.

G. Baggio & F. Ferrari

University of Modena, Institute of Pharmacology, I-41100 Modena, Italy.

Psychopharmacology, **70**, 63 (1980)

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A. A. Borbely & I. Tobler

University of Zurich, Faculty of Medicine, Institute of Pharmacology, CH-8006 Zurich, Switzerland.

Trends in Pharmacological Sciences, **1**, 356 (Sep. 80)

R81B113. Sensitivity of ventromedial hypothalamic units to rostral and caudal brain stem reticular inputs.

V. M. Kumar, S. K. Sikdar, G. S. Chhina & B. Singh

All India Institute of Medical Sciences, Dept. Physiology, New Delhi-110 029 India.

Brain Research, **196**, 530 (8 Sep. 80)

R81B114. Separation of potent central and renal dopamine agonist activity in substituted 6-chloro-2, 3, 4, 5-tetrahydro- 7, 8 dihydroxy-1-phenyl-1H-3-benzazepines.

J. Weinstock & others

SK & F Laboratories, Philadelphia, PA, 19101, USA.

J. of Medicinal Chemistry, **23**, 973 (Sep. 80)

R81B115. Serotonergic and non-serotonergic projections from the nucleus raphe dorsalis to the caudate-putamen complex in the rat, studied by a combined immunofluorescence and fluorescent retrograde axonal labelling technique.

H. W. M. Steinbusch & others

Catholic University of Nijmegen, Dept. Anatomy & Embryology, NL-6500 HB Nijmegen, Netherlands.

Neuroscience Letters, **19**, 137 (Sep. 80)

R81B116. Serotonin receptors in hippocampus and frontal cortex.

P. Seeman, K. Westman, D. Coscina & J. J. Warsh

University of Toronto, Dept. Pharmacology, Toronto, Ontario, Canada M5S 1A8.

European J. of Pharmacology, **66**, 179 (29 Aug. 80)

R81B117. Similarities between cold- and diet-induced thermogenesis in the rat.

N. J. Rothwell & M. J. Stock*

St. Georges Hospital, Dept. Physiology, London SW27 ORE, England.

Canadian J. of Physiology and Pharmacology, **58**, 842 (July 80)

R81B118. A new histamine H₂-receptor antagonist SK & F 92994.

R. C. Blakemore & others

SK & F Laboratories Limited, Research Institute, Welwyn Garden City L7 1EY Hertfordshire, England.

British J. of Pharmacology, **70**, 105 (Sep. 80)

R81B119. Studies on the difference in the biological activities induced by pyrogen in rabbits restrained by two different methods.

A. Nishio & S. Kanon

Kagoshima University, Faculty of Agriculture, Dept. Veterinary Pharmacology, Kagoshima 890, Japan.

Japanese J. of Pharmacology, **30**, 568 (Aug. 80)

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W. I. Cranston, R. F. Hellon & T. Yvonne

St. Thomas Hospital & Medical School, Dept. Medicine, London SE 1 7EH, England.

J. of Physiology, **305**, 337 (Aug. 80)

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J. Hedreen

Johns Hopkins University, School of Medicine, Dept. Cell Biology & Anatomy, Baltimore, MD, 21205, USA.

Brain Research Bulletin, **5**, 425 (July-Aug. 80)

R81B122. Thermoregulation in doves (Columbidae); A novel esophageal heat exchanger.

S. L. L. Gaunt†

Science, **210**, 445 (24 Oct. 80)

R81B123. Thermoregulation in talazol (CI-744) -anesthetized rhesus monkey (*Macaca mulatta*).

K. R. Holmes & W. S. Hunter

University of Illinois, Faculty of Bioengineering, Dept. Veterinary Bioscience, Urbana, IL, 61801, USA.

American J. of Physiology, **239**, R241 (Sep. 80)

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W. G. Clark & S. W. Ponder

University of Texas, Health Science Centre, South-Western Medical School, Dept. Pharmacology, Dallas, TX 75235, USA.

Brain Research Bulletin, **5**, 415 (July-Aug. 80)

R81B125. Thermoregulatory effects of guanosine 3', 5'-monophosphate in the cat.

M. J. Dascombe & A. S. Milton

University of Manchester, Dept. Pharmacological Material Medicine & Therapeutics, Manchester M139PT Lancashire, England.

British J. of Pharmacology, **70**, 154 (Sep. 80)

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D. A. Thompson & others

Monroe Community Hospital, Endocrine Metabolism Unit, Rochester, NY, 14603, USA.

American J. of Physiology, **239**, 291 (Sep. 80)

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R. Francesconi & M. Mager

USA, Environmental Medicine Research Institute, Natick, MA, 01760, USA.

American J. of Physiology, **239**, R214 (Sep. 80)

R81B128. Time-course effects of two barbiturates on cardiovascular activity and temperature in the squirrel monkey.

L. D. Byrd

Emory University, Yerkes Regional Primate Research Centre, Atlanta, GA, 30322, USA.

Life Sciences, **27**, 935 (15 Sep. 80)

R81B129. What we don't know about pain.

P. D. Wall & C. J. Woolf

University of London University College
Dept. Anatomy, Cerebral Function
Research Group, London WC1E 6BT,
England.

Nature, **287**, 185 (18 Sep. 80)

C. Cardiovascular System

R81C001. Acebutolol and hydrochlorothiazide in essential hypertension.

J. Nadeau, R. I. Ogilvie*, R. Ruedy &
J. J. Brossard

Montreal General Hospital, Div. Clinical
Pharmacology, Montreal, Quebec, Canada
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Clinical Pharmacology and Therapeutics, **28**,
296 (Sep. 80)

R81C002. Acute renovascular hypertension in conscious dogs. Interaction of the renin-angiotensin system and sympathetic nervous system in systemic hemodynamics and regional blood flow responses.

H. Gavras & C. Liang

Boston University, School of Medicine,
Dept. Medicine, Boston, MA, 02118,
USA.

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A. P. Gaputi, B. H. Camilleri & H. E.
Brezenoff

College of Medicine & Dentistry New
Jersey, New Jersey Medical School,
Dept. Pharmacology, Newark, NJ, 07103,
USA.

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W. L. Matier & J. E. Byrne

Mead Johnson Pharmaceuticals,
Evansville, IN, USA.

Annual Report in Medicinal Chemistry, **15**, 89
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J. Lindenfeld, M. H. Crawford*, R. A.
Orourke, S. P. Levine, M. N. Montiel &
L. D. Horwitz

University of Texas, Health Science
Centre, Dept. Medicine, San Antonio,
TX, 78284, USA.

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J. Conway

ICI Limited, Dept. Biology, Div. Pharmaceuticals, Macclesfield SK10 4TG, Cheshire, England.

Archives Internationales de Pharmacodynamie et de Therapie, **Suppl.**, 83 (1980)

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S. F. Campbell & J. C. Danilewicz

Pfizer Limited Central Research, Sandwich, Kent, England.

Annual Report in Medicinal Chemistry, **15**, 79 (1980)

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M. J. Davey

Prizer Limited, Central Research, Sandwich; Kent, England.

Medical J. of Australia, **2**, 4 (26 July 80)

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C. G. Caillard & J. C. Louis

Centre Nicolas Grillet, 13 Quai Jules Guesle, F-94400 Vitry Sur Seine, France.

Methods and Findings in Experimental and Clinical Pharmacology, **2**, 223 (Oct. 80)

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R. Lang

University of Cologne, Medical Polyclinic, D-5000 Cologne 41, Federal Republic of Germany.

Archives Internationales de Pharmacodynamie et de Therapie, **Suppl.**, 67 (1980)

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O. P. Gulati & G. Ponard

Zyma Sa, Dept. Research, CH-1260 Nyon, Switzerland.

Experientia, **36**, 984 (15 Aug. 80)

R81C012. The cardiovascular effect of chloroquine in anaesthetized dogs.

D. A. Sofola

University of Lagos, College of Medicine, Dept. Physiology, Lagos, Nigeria.

Canadian J. of Physiology and Pharmacology, **58**, 836 (July 80)

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R. W. Rockhold & R. W. Caldwell

University of Tennessee, Centre for Health Science, Dept. Physiology & Biophysics, Memphis, TN, 38163, USA.

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C. Pasotti, P. Gandolfi & G. Vibelli

Voghera General Hospital, Dept. Medicine, I-27058 Voghera, Italy.

Current Therapeutic Research, **28**, 235 (Aug. 80)

R81C015. Central cardiovascular effects of nyldrin (buphenine)

B. Fichti & W. Feli

University of Munich, Institute of Pharmakology, D-8000 Munich 2, Federal Republic of Germany.

European J. of Pharmacology, **65**, 333 (8 Aug. 80)

R81C016. Characterization of the clonidine withdrawal syndrome in the normotensive rat.

P. Distefano, G. Fox & E. M. Jonson*

Washington University, School of Medicine, Dept. Pharmacology, St. Louis, MO, 63110, USA.

J. of Pharmacology and Experimental Therapeutics, **214**, 263 (Aug. 80)

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C. Mauron, J. J. Wurtman & R. J. Wartman

MIT, Dept. Nutrition & Food Sciences, Neuroendocrine Regulatory Laboratory, Cambridge, MA, 02139 USA.

Life Sciences, **27**, 781 (1 Sept. 80)

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G. D. Lamming, F. B. Pipkin & E. M. Symonds

University of Nottingham, City Hospital, Dept. Obstetrics & Gynaecology, Nottingham NG7 2RD, England.

Clinical and Experimental Hypertension, **2**, 865 (1980)

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D. R. Richmond

Royal Prince Alfred Hospital, Campendown, NSW 2050, Australia.

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P. J. Clipsham, T. C. Hamilton, A. A. E. Hunt & R. H. Poyser

Beecham Pharmaceuticals, Medicine Research Centre, Coldharbour Road, The Pinnacles, Harlow, Essex, England

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M. Koster

University of Amsterdam, Wilhelmina Gasthuis, Dept. Internal Medicine, Amsterdam, Netherlands.

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I. Yamaguchi & I. J. Kopin*

NIMH, Clinical Science Laboratory, Building 10, Room 2D-46, Bethesda, MD, 20205, USA.

J. of Pharmacology and Experimental Therapeutics, 214, 275 (Aug. 80)

R81C025. Dose response in capital therapy of hypertension.

P. Linen, R. Fagard & J. Staessen

Catholic University of Leuven, Hospital St. Rafael, Dept. Pathophysiology, Hypertension Unit, B-3000 Lauvain, Belgium.

Clinical Pharmacology and Therapeutics, 28, 302 (Sep. 80)

R81C026. Drug interactions with digoxin

D. D. Brawn, R. Spector & R. P. Juhl

University of Iowa Hospital & Clinic, Dept. Medicine, Iowa City, IA, 52242, USA.

Drugs, 20, 179 (Sept. 80)

R81C027. The effect of digoxin on the blood vessels.

E. Mikkelsen & O. L. Pedersen

Aarhus University, Institute of Pharmacology, DK-8000 Aarhus C, Denmark.

Deutsche Medizinische Wochenschrift, 105, 1269 (12 Sep. 10)

R81C028. Effect of GABA analogues on blood pressure and central GABA metabolism in the rat.

B. Person & M. Henning

Gothenburg University, Dept. Pharmacology, S-40033 Gothenburg 22, Sweden.

Acta Pharmacologica et Toxicologica, 47, 135 (Aug. 80)

R81C029. The effect of opiates on baroreceptor reflex sensitivity in the normotensive rabbit.

M. A. Petty & J. L. Reid

University of Glasgow, Stobhill General Hospital, Dept. Material Medicine, Glasgow G21 3UW, Glasgow, Scotland.

British J. of Pharmacology, 70, 64 (Sep. 80)

R81C030. The effect of temperature upon the responses of isolated cardiac muscle to sympathomimetic amines.

K. J. Broadley

UWIST, Welsh School of Pharmacy,
Dept. Applied Pharmacology, Cardiff
CF1 3NU, South Glamorgan, Wales.

Methods and Findings, **2**, 181 (Aug. 80)

R81C031. Effects of clonidine on diuresis, water intake and blood pressure in normal and diabetes insipidus conscious dogs.

J. L. Mantasturc & P. Montasturc

Faculty of Medicine Toulouse, Applied
Physiology Medical Pharmacology
Laboratory, 37 Allées Jules Guesde,
F-31000 Toulouse, France.

J. de Pharmacologie, **11**, 187 (Apr.-June 80)

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H. H. Wang, P. S. Kulkarni & K. E. Eakins

Columbia University, College of
Physicians & Surgeons, Dept. Pharma-
cology, New York, NY, 10032, USA.

European J. of Pharmacology, **66**, 31 (22 Aug. 80)

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L. I. Goldberg & others.

University of Chicago, Dept. Pharmacology
& Physiological Science, Communications
in Clinical Pharmacology, Chicago, IL,
60637, USA.

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D. Tsoucaris-Kupfer, D. Bogaievsky & H. Schmitt

Broussais Hotel Dieu, Faculty of
Medicine, Dept. Pharmacology, Paris,
France.

*Clinical and Experimental Pharmacology &
Physiology*, **7**, 355 (July-Aug. 80)

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D. T. Nash

Upstate Medical Centre, Dept. Medicine,
600E, NY, 13202, USA.

J. of Medicine, **11**, 107, (80)

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R. A. Zito & others

Veterinary Administration Hospital,
Medicine Centre, Div. Cardiology, West
Haven, CT, 06516, USA.

Yale J. of Biology and Medicine, **53**, 173,
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J. C. Somberg, H. Bounous, N. Cagin & B. Levitt

Harvard University, Peter Bent Brigham Hospital, School of Medicine, Dept. Medicine, Div. Cardiovascular, Boston, MA, 02115, USA.

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- R81C038. Hypertension in the elderly.**

W. M. Kirkendall

University of Texas, School of Medicine, Dept. Internal Medicine, Div. Hypertension, Houston, TX, 77025, USA.

Archives of Internal Medicine, **140**, 1155 (Sep. 80.)

- R81C039. Hypcholesterolemic effect of red pepper and capsaicin.**

K. Sambaiah & M. N. Satyanarayana

Central Food Technology Research Institute, Mysore 570 013, India.

Indian J. of Experimental Biology, **18**, 898 (Aug. 80)

- R81C040. Hypotensive effects of cardiac glycosides in spontaneously hypertensive rats.**

S. Ayachi & A. M. Brown

University of Texas, Medicine Branch, Dept. Physiology & Biophysics, Galveston, TX, 77550, USA.

J. of Pharmacology & Experimental Therapeutics, **213**, 514 (June 80)

- R81C041. Investigation into different types of post and presynaptic α -adrenoceptors at cardiovascular sites in rats.**

W. Kobinger & L. Pichler

Ernst Boehringer Institute, Arzneimittelforschung Dept. Pharmacology, Dr. Boehringer Gasse 511, A-1121 Vienna, Austria.

European J. of Pharmacology, **65**, 393 (8 Aug. 80)

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(Editorial)

Lancet, **II**, 459 (30 Aug. 80)

- R81C043. Mechanism of positive chronotropic and inotropic effects induced by 4-methylhistamine.**

S. Chiba, Y. Furukawa & M. Kobayashi

Sinshu University, Faculty of Medicine, Dept. Pharmacology, Matsumoto, Nagano 390, Japan.

Japanese J. of Pharmacology, **30**, 562 (Aug. 80)

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P. Bousquet, J. Feldman, R. Bloch & J. Schwartz

Institute of Pharmacology & Medicine Experimental, 11 Rue Humann, F-67000 Strasbourg, France.

European J. of Pharmacology, **65**, 293 (25 July 80)

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B. A. Rofman & others

Merck Sharp & Dhome, Research Laboratories, West Point, PA, 19486, USA.

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W. F. Krol

Maryland Medical Research Institute
Paris, Coordinating Centre, 600
Wyndhurst Avenue, Baltimore, MD,
21210, USA.

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P. Lukacsko, E. J. Messina & G. Kaley*

New York Medical College, Dept.
Physiology, Valhalla, NY, 10595, USA.

Hypertension, **2**, 657, (Sep. 80)

R81C048. Responses of rabbit isolated basilar artery to transmural nerve stimulation, noradrenaline and 5-hydroxytryptamine.

N. Anwar & D. F. J. Mason

St. Bartholomews Medical College, Dept.
Pharmacology London EC1M6BQ,
England.

British J. of Pharmacology, **70**, 128 (Sep. 80)

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M. Karmazyn & N. S. Dhalla

University of Manitoba, Faculty of
Medicine, Dept. Physiology, Div.
Experimental Cardiology, Winnipeg
Manitoba, Canada R3E OW3.

Experientia, **36**, 996 (15 Aug. 80)

R81C050. Skin blood flow in humans as a function of environmental temperature measured by ultrasound.

M. Thoresen & L. Walloe

University of Oslo, Institute of Physiology,
Oslo, Norway.

Acta Physiologica Scandinavica, **109**, 333
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S. H. S. Makoni & J. K. Sugden*

City Leicester Polytechnic, School of
Pharmacology, Leicester LE1 9BH,
England.

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G. W. G. Redman

John Radcliffe Hospital, Nuffield Dept. Obstetrics & Gynaecology, Oxford OX3 9DU, England.

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L. E. Oliver & others

Austin Hospital, Dept. Cardiology, Heidelberg. Vic 3089, Australia.

Medical J. of Australia, 2, 42 (26 July 80)

D. Respiratory System

R81D001. The action of sodium cromoglycate on fibre endings in the dog lung.

M. Dixon, D. M. Jackson & I. M. Richards

Fisons Limited, Div. Pharmaceutics, Research and Development Laboratories, Dept. Pharmacology, Loughborough, Leicestershire, England.

British J. of Pharmacology, 70, 11 (Sep. 80)

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T. McGowan, & D. E. Niewoehner

Veterans Administration Hospital, Medical Centre, Pulmonary Section, Minneapolis, MN, 55417, USA.

Lung, 158, 81 (1980)

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S. T. Holgate & others

Southampton General Hospital, Faculty of Medicine, Southampton SO9 4XY, Hampshire, England.

Clinical Science, 59, 155 (Sep. 80)

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F. B. Casey

Sterling Winthrop Research Institute, Dept. Pharmacology, Immunopharmacology Section, Rensselaer, NY, 12144, USA.

J. of Pharmacology & Experimental Therapeutics, 213, 432 (June 80)

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C. A. Free & L. E. Hall

Squibb Institute of Medical Research, Dept. Pharmacology, POB 400, Princeton, NJ, 08540, USA.

J. of Pharmacology & Experimental Therapeutics, 213, 437 (June 80)

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H. Chai

National Asthma Centre, 1999 Julian Street, Denver, CO, 80204, USA.

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S. F. Gonsalves & H. L. Borisom

Dartmouth College, School of Medicine,
Dept. Pharmacology & Toxicology,
Hanover, NH, 03755, USA.

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G. Rossoni & others

University of Milan, Institute of Pharmacology and Pharmacognosy, I-20129 Milan, Italy.

Prostaglandins, **20**, 129 (Sep. 80)

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M. A. Wasserman & others

Upjohn Company, Dept. Hypersensitive Disease Research, Kalamazoo, MI, 49001, USA.

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O. Cromwell, M. G. Harries & J. Pepys

Brompton Hospital, Institute of Cardiothoracic, Dept. Clinical Immunology, London SW36HP, England.

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S. Kubo & others

Hokuriku Seiyaku Company Limited,
Research Laboratory, Fukui, Japan.

Arzneimittel Forschung—Drug Research, **30-2**, 1272 (1980)

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A. F. Junod

University of Geneva, Hopital Cantonal,
Dept. Medicine, Div. Pneumology, CH-1211 Geneva 4, Switzerland.

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J. P. Devlin

Boehringer Ingelheim Limited, Research and Development, Ridgefield, CT, 06877, USA.

Annual Report in Medicinal Chemistry, **15**, 59 (1980)

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P. Harichaux & others

Uer Medicine, Physiology, Laboratory,
12 Rue Frederic Petit, F-80036 Amiens, France.

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E. Gastrointestinal Disorders

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R. D. Reynolds & S. V. Calzadilla

American Crit Care, Dept. Pharmaceutics Research, McGaw Park, IL, 60085, USA.

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I. Szelenyi & H. Vergin

Heuman Pharma, Dept. Pharmacology, Heideloßstr 18-28, D-8500 Nurnberg, Federal Republic of Germany.

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H. K. Lau & C. W. Ogle

University of Hong Kong, Faculty of Medicine Dept. Pharmacology, Hong-kong, Hongkong.

Experientia, **36**, 995 (15 Aug. 80)

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T. Mukai & K. Kubota

University of Tokyo, Faculty of Pharmaceutical Science, Dept. Pharmacology, Tokyo 162, Japan.

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G. Delle Fave

University of Rome. Cattedra Gastroenterology, I-00100 Rome, Italy.

Life Sciences, **27**, 993 (15 Sep. 80)

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A. K. Ganguly, K. Somasundaram, R. H. Majithia & V. K. Chawla

Government Medical College, Dept. Physiology, Surat, 395001 India.

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J. F. Rivas-V & R. Garcia

University of Autonoma Metropolitana, Izatapalapa, Mexico City 13, DF, Mexico.

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L. Halparin & J. Ruedy

St. Paul Ramsey Hospital & Medical Centre, Dept. Medicine, St. Paul, MN, 55101, USA.

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University of Amsterdam, Div. Pharmacotherapy, Dept. Pharmacy, NL-1018 TV Amsterdam, Netherlands.

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M. L. Skoglund, J. G. Gerber, R. C. Murphy & A. S. Nies

University of Colorado, Health Science Centre, Div. Clinical Pharmacology & Toxicology, Denver, CO, 80262, USA.

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University of Natal, MRC, Disease Tropical Environmental Research Institute, Congella 4013, South Africa.

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J. Weingart, H. Kunert & R. Ottenjann

Hospital Munich Neuperlach, Oskar Maria Graf Ring 51, Dept. Gastroenterology & Hepatology, D-8000 Munich 83, Federal Republic of Germany.

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McMaster University, Dept. Psychology, Hamilton, Ontario, Canada L8S 4K1.

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University of Strathclyde, Dept. Physiology & Pharmacology, Glasgow G1 1XW, Scotland.

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R. T. Owen

Wellcome Foundation, Div. Science Service, Crewe Hall, Crewe, Cheshire, England.

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Troponwerke GmbH & Company KG, Pharmakology Forschung Abteilung, Berliner Strasse 156, D-5000 Köln 80, Federal Republic of Germany.

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Erasmus University, Faculty of Medicine, Dept. Pharmacology, NL-3000 Drive, Rotterdam, Netherlands.

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Veterans Administration Hospital, Dept. Anesthesia Research V151, San Diego, CA, 92161, USA.

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Helen Hayes Hospital, Arthritis Unit,
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Up John Company, Hypertensive
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Miles Laboratories Incorporated, Dept. Toxicology, POB 40, Eikhart, IN, 46514, USA.

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Louis University, School of Medicine, Internal Medicine, St. Louis, MO 63104, USA.

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T. D. Hexum, H. Y. T. Yang & E. Costa

St. Elizabeths Hospital, NIMH, Preclinical Pharmacology Laboratory, Washington, DC, 20032, USA.

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Kitasato University, School of Medicine, Dept. Pharmacology. Sugamihapara, Kanagawa 228, Japan.

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L. L. Simpson

Columbia University College of Physicians & Surgeons, Dept. Pharmacology, New York, NY, 10032 USA.

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Harvard University, School of Medicine,
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Johns Hopkins University, School of
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University of Bradford, Postgraduate
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Free University of Brussels, School of
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Duke University, Medical Centre,
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University of Arizona, Arizona Health
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Tucson, AZ, 85724, USA.

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Kanazawa University, Institute of Cancer
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University of Alabama, Dept. Psychiatry,
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University of Minnesota, Health Science
Centre, Dept. Laboratory Medicine &
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ICI Limited, Dept. Biology, Div.
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AB Hassle, Dept. Pharmacology, S-43183
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M. Garty & A. Hurwitz*

University of Kansas, Medical Centre,
Centre for Clinical Pharmacology &
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St. Josephs Hospital, Clinical Chemistry
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P. Kalix

University of Geneva, Dept. Pharma-
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University of Ottawa, Dept. Biology, Ottawa, Ontario, Canada K1N6N5.

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University of Kansas, Dept. Medicinal Chemistry, Lawrence, 66045, USA.

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L. Resnekov

University of Chicago, Medical Centre, Chicago, IL, 60637, USA.

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Astra Werke AG, Dept. Tumor Research, Postfach 140129, D-4800 Bielefeld 14, Federal Republic of Germany.

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Animal Medical Centre, Dept. Pathology, 510E 62 ND Street, New York, NY, 10021 USA.

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Eli Lilly and Company, Lilly Research Laboratory, Dept. Cell Bioglogy, POB 618, Indianapolis, IN, 46206, USA.

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Glaxo Group Research Limited, Dept. Pharmacology, Ware, Hertfordshire, England.

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S. Schwartz-Giblin & D. W. Pfaff

Rockefeller University, New York, NY, 10021, USA.

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E. K. Jackson & W. B. Campbell*

University of Texas, Health Science Centre, Dept. Pharmacology, Div. Clinical Pharmacology, Dallas, TX. 75235, USA.

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W. G. Young

University of California San Diego, Dept. Neuro-Science, Lajolla, CA, 92093, USA.

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A. R. Gin, M. G. Hayward & W. R. Keatinge

London Hospital, College of Medicine, Dept. Physiology, London E 12AD, England.

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SUNY, Upstate Medical Centre, Dept. Pharmacology, Syracuse, NY, 13210, USA.

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Wellcome Research Laboratories, Dept. Prostaglandin Research, Beckenham BR3 3BS, KENT, England.

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Janssen Pharmacy, Dept. Pharmacology, B-2340 Beerse, Belgium.

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D. V. Harris & J. M. Walker

University of California Santa Cruz, Thimann Laboratories, Santa Cruz, CA, 95064, USA.

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A. Husain & C. W. Jones

Cleveland Clinical Education Foundation, 9500-Euclid Avenue, Cleveland, OH, 44106, USA.

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Nihon University, School of Medicine, Dept. Internal Medicine 2, Habashi Ku, Tokyo 101, Japan.

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M. T. Shipley & M. Graf

Northwestern University, School of Medicine, Dept. Anatomy & Cell Biology, Chicago, IL, 60611, USA.

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A. R. Light & M. Rethelyi

University of North Carolina, Dept. Physiology, Chapel Hill, NC, 27514, USA.

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St. Bartholomews Hospital, Dept. Clinical Pharmacology, London EC1A 1BE, England.

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University of Cambridge, Physiology Laboratory, Cambridge CB 2 3EG, England.

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University Complutense Madrid, Faculty of Pharmacy, Dept. Quim Organic, Madrid, Spain.

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University of Oviedo, Faculty Ciencias, Dept. Quim Organic, Oviedo, Spain.

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N. Vinot & P. Maitte

University of Paris, Laboratory Chimie Heterocyclic, 75230 Paris Cedex 05, France.

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H. Hagen, R. D. Kohler & H. Fleig

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Nagoya University, Faculty of Engineering Nagoya 464, Japan.

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Ciba-Geigy Research Centre, Goregaon, Bombay 400063, India.

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V. K. Ahluwalia & S. Dhingra

University of Delhi, Dept. Chemistry, Delhi 110007, India.

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S. Ohta & M. Okamoto

Kyoto College of Pharmacy, Yamashina-ku, Kyoto 607, Japan.

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Madras University, Postgraduate Centre, Coimbatore, India.

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I. Lalezari, S. Nabahi

Montefiore Hospital & Medical Centre, Dept. Medicine, Div. Immunohematology, Bronx, NY, 10467, USA.

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W. Strohmeier, M. Michel & L. Weigelt

University of Wurzburg, Institute of Physical Chemistry, D-8700 Wurzburg, West Germany.

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V. Schollkopf & K. H. Scheunemann

University of Gottingen, Organic Chemistry Institute, D-3400 Gottingen, West Germany.

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Friedrich Wilhelms University, Pharmaceutical Institute, Bonn, West Germany.

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S. K. Talaptra, P. Chaudhuri & B. Talapatra

University College of Science, Dept. Chemistry, Calcutta-700009, India.

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G. D. Pandey & K. P. Tiwari

University of Allahabad, Dept. Chemistry, Allahabad 211 002, India.

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G. Doleschall & K. Simonormai

Technical University of Budapest, Dept.
Organic Chemistry, A-1521 Budapest,
Hungary.

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FORTHCOMING MEETINGS

Molecular Interrelations of Nutrition and Cancer. 34th Annual Research Symposium.

Houston, 4-6 Mar. 81

Steve Stuyck,
C/o M. D. Anderson Hospital,
Houston, TX, 77030,
USA.

Workshop on Techniques Employed in Light Microscopic Studies for Biology Teachers.

Madras, Mar. 81

Dept. Anatomy.
Postgraduate Institute of Basic Medical Sciences,
Madras, India.

3rd National Conference on Sexology.

Jabalpur, 14-17 Mar. 81

Organising Secretary,
Dr. B. K. Guha,
Government Medical College.
Jabalpur, India.

XI All India Conference of National Integrated Medical Association.

Bombay, 9-10 May 81

Conference Secretariat,
G-2, Mohan Kunj,
Mahatma Jyotiba Phule Road,
Naigon, Dadar,
Bombay 400 014, India.

EMBO Workshop on Phosphorylation of Proteins and Genetic Expression.

Paris, 26-28 Mar. 81

Dr. J. Loeb,
IRSC, B. P. No 8,
94800 Villejuif,
France.

Seventh Summer Program in Methods of Immunologic Research and Diagnosis.

First All India Symposium and Workshop on Anaerobic Infections in Man.

New Delhi, Mar. 81

Dept. Microbiology,
All India Institute of Medical Sciences,
New Delhi 110 029, India.

Buffalo, 1-13, June 81

James F. Mohn,
Ernest Witebsky Center for Immunology,
State University of New York,
210 Sherman Hall,
Buffalo, NY, 14212, USA.

International Workshop on Herpesviruses.

Bologna, 27-31 July 81

Dr. Fred Rapp,
Dept. Microbiology,
Pennsylvania State University,
Hershey, PA, 17033,
USA.

XV Annual Conference of Urological
Society of India.

Bombay, 25-27 Sep. 81

Organising Secretary,
Dr. A. Bhajekar,
Port Trust Hospital,
Antop Hill,
Bombay 400 037, India.

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A. Endocrine System

R81A008. Antifertility activity of (+) gossypol.

R. S. R. Murthy, D. K. Basu & V. V. S. Murti

College of Pharmacy,
New Delhi-110 012.

Current Science, **L**, 64 (20 Jan 1981).

R81A009. Changes in intramembranous particle distribution in the plasma membrane of *Didelphis virginiana* spermatozoa during maturation in the epididymis.

G. E. Olson

University N. Dakota, Dept Anat,
Grand Forks, ND, 58202 USA.

Anatomical Record, **197**, 471 (Aug 80)

R81A010. Changes in the acetylcholinesterase activity of mammalian spermatozoa during maturation.

G. N. Egbunike

University of Ibadan, Dept. Animal
Science, Idadan, Nigeria.

International J. of Andrology, **3**, 459
(Aug 80).

R81A011. Deoxyribonucleic acid flow cytometry of germ cells in the investigation of male infertility.

O. P. F. Clausen, & T. Abyholm

University, Oslo, Rikshosp, Institute
Forensic Medicine, Oslo, Norway.

Fertility and Sterility, **34**, 369 (Oct. 80)

R81A012. Effects of prostaglandins $F_2\alpha$ and F_2 on the contractility of non-pregnant human fallopian tube *in vitro*.

M. T. M. Jiffry & P. Virutamasen

Dept. Physiology, Faculty of Medicine,
University of Peradeniya, Sri Lanka.

Indian J. of Physiology & Pharmacology, **24**,
165 (July-Sep 80).

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T. G. Cooper & C. H. Yeung

University of Bristol, School of Medicine,
Dept. Physiology, Bristol BS 81TD, Avon,
England.

International J. of Andrology, **3**, 367
(Aug 80).

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O. Djoseland & others

Laboratory of Endocrinology, Medical
Department, Rikshospitalet, Oslo 1,
Norway.

International J. of Andrology, **3**, 363 (Aug 80)

R81A015. Fertility status of men following vaso-vasostomy.

M. L. Mehrotra, R. L. Gupta, A. M. Nagar, R. B. Singh & B. K. Jain

Department of Pathology and Surgery
L. L. R. M. Medical College, Meerut.

Indian J. of Medical Research, **33**, 33
(Jan. 81).

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T. G. Cooper

University of Bristol, School of Medicine,
Dept. Physiology, Bristol, BS 81TD,
Avon, England.

International J. of Andrology, **3**, 333
(Aug 80).

R81A017. 17β Hydroxysteroid dehydrogenase in monkey endometrium during the menstrual cycle and at the time of implantation.

O. Kreitmann, F. Bayard & G. D. Hodgen

National Institute of Child Health & Human Development, Pregnancy Research Branch, Endocrinology Section, Bethesda, MD, 20205, USA.

Steroids, **36**, 365 (Sep 80).

R81A018. A multi-channel system for the measurement of spermatozoan collective motility.

A. Mayevsky, D. Bar-Sagle & B. Bartoov

Bar Ilan University, Dept. Life Science,
Ramat Gan, Israel.

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H. Nash, G. P. Talwar, S. Segal, T. Luukkainen, E. D. B. Johansson, J. Vasquez, E. Coutinho & K. Sundaram

Rocketteller University, Population Council,
New York 10021, USA.

Fertility and Sterility, **34**, 328 (Oct 80).

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P. F. McComib, S. A. Halbert & V. Gomel

University British Columbia, Dept. Obstet & Gynaecol, Vancouver BC, Canada V53 1M9.

Fertility and Sterility, **34**, 386 (Oct 80).

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R. C. Gupta, S. Durani, A. K. Agarwal, V. P. Kamboj & Nitya Anand

Central Drug Research Institute, Lucknow
226001.

Indian J. of Chemistry, **19B**, 886 (Oct 80).

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K. V. B. Rao & R. N. Iyer

Division of Medicinal Chemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Chemistry, **19B**, 992 (Nov 80).

R81A023. Testosterone and 17 OH-progesterone responses in men to 3-H LH infusions.

H. R. Nankin, T. Lin, E. Murono, J. Osterman, P. Troen

Veteran Administration Hospital, Columbia, SC, 29201, USA.

Acta Endocrinologica, **95**, 110 (Sep 80).

B. Nervous System

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M. Dhaon, N. Kumar, S. K. Agarwal, A. K. Saxena, (Late) P. C. Jain & Nitya Anand

Department of Chemistry & Biochemistry Utah State University, Logan, Utah-84322, USA.

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I. P. Lapin

VM Bekhterv Psychoneurology Research Institute, Psychopharmacology Laboratory Leningrad, USSR.

Psycho-Pharmacology, **70**, 179 (1980).

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R. Bergland & others

Harvard University School of Medicine, Boston, Massachusetts 02115, USA.

Science, **210**, 541 (31 Oct 80)

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J. Anderson, E. Aabro, N. Gulma, A. Hjelmsted & H. Pedersen

County Hospital Nordvang, Dept. R. DK-4000 Glostrup, Denmark.

Acta Neurologica Scandinavica, **62**, 210 (Oct. 80)

R81B135. Anti-inflammatory and CNS depressant activities of xanthenes from *Calophyllum inophyllum* & *Mesua ferrea*.

C. Gopalkrishnan & others

Dept. Pharmacology, Postgraduate Institute of Basic Medical Sciences, University of Madras, Madras 600 042.

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I. Izquierdo, D. O. Souza, M. A. Carrasco, R. D. Dias, M. L. Perry, S. Eisinger, E. Elisabetsky & D. A. Vendite

Univ Federal Rio Grande Sul, Institute Biociencias, Dept. Bioquim, Porto Alegre 9000, RS Brazil.

Psycho-Pharmacology, **70**, 173 (1980)

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G. Hocman

Center for Occupational Medicine, Preventive Medicine Research Institute, CS-80958, Bratislava, Czechoslovakia.

International J. of Biochemistry, **12**, 515 (1980)

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Lancet, **II**, 895 (25 Oct. 80)

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V.R. Dhumal, O.D. Gulati & V.H. Bhavsar

Government Medical College, Dept. Pharmacology, Surat, India.

J. of Pharmacy and Pharmacology, **32**, 724 (Oct. 80)

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J. McCulloch & L. Edvinsson

University of Glasgow, Wellcome Surgical Institute, Glasgow G61 1QH, Scotland.

European J. of Pharmacology, **66**, 327 (5 Sep. 80)

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D. B. Calne

Harvard University School of Medicine, Human Reprod & Reprod Biol Lab, Boston, MA, 02115, USA.

Trends in Pharmacological Sciences, **1**, 412, (Oct. 80)

R81B142. Cumulative dose-response curves in behavioral pharmacology.

G. R. Wenger

University Arkansas Medical Science, Dept. Pharmacology Liule Rock, AR, 72205 USA.

Pharmacology Biochemistry & Behaviour, **13**, 647 (Nov. 80)

R81B143. Diurnal variations in thermoregulatory responses to intrahypothalamic and intravenous injections of noradrenaline in the pigeon.

H. Rintamaki & R. Hissa

Department of Zoology, University of Oulu, Finland

Experientia, **36**, 1083 (15 Sep. 80)

R81B144. Effects of brain monoamine depletion on thermoregulatory responses of rabbits to different hypothalamic temperatures.

M. T. Lin

Yale University, School of Medicine, John B Pierce Foundation Laboratory, New Haven, CT, 06519, USA.

Experimental Neurology, **70**, 226 (Nov. 80)

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H. J. R. Keshavan, N. K. Gurbani & P. C. Dandiya

SMS Medical College, Dept. Pharmacology, Jaipur.

Psycho-Pharmacology, **70**, 209 (1980)

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C. Gorenstein & S. H. Snyder

Johns Hopkins University, Dept. Pharmacology & Experimental Therapeutics, Baltimore, MD, 21205, USA.

Proceedings of the Royal Society of London, **210**, 123 (29 Oct. 80)

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P. M. Groves & C. J. Wilson

University of California San Diego, School of Medicine, Dept. Psychiatry, LA Jolla, CA, 92037, USA.

Comparative Neurology, **193**, 841 (15 Oct. 80)

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H. Lahti, A. Pyormila & R. Hissa

University Oulu, Dept. Zoology, Sf. 90220 Oulu 22, Finland.

Experientia, **36**, 1188 (15 Oct. 80)

R81B149. Inhibition of neuroleptic-induced dopamine receptor supersensitivity by cyclo (Leu-Gly).

H. N. Bhargava & R. F. Ritzman

University of Illinois Medical Center, Dept. Pharmacognosy & Pharmacology, Chicago, IL, 60612, USA.

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S. Yehuda† & A. J. Kastin

Peptides, **1**, 243 (Autumn 1980)

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P. M. Groves & C. J. Wilson

University of California San Diego, School of Medicine, Dept. Psychiatry, LA Jolla, CA, 92037, USA.

Comparative Neurology, **193**, 853 (15 Oct. 80)

† Address not available.

R81B152. Malignant hyperthermia.

G. A. Gronert

Mayo Medical School, Dept. Anesthesiology,
Rochester, Mn, 55901, USA.*Anesthesiology*, **53**, 395 (Nov. 80)**R81B153. A morphological characterization of the canine area postrema.**C. L. Chernicky, K. L. Barnes*, J. P.
Conomy & C. M. FerrarioCleveland Clinical Educational Foundation,
Div. Research, Cleveland, OH, 44106 USA.*Neuroscience Letters*, **20**, 37 (20 Oct. 80)**R81B154. Neuroactive, a discussion organized by Sir Arnold Burgen, F. R. S. H. W. Kosterlitz, F. R. S. & L. L. Iversen, (Discussion Held 30-31 Jan 1980).**National Institute of Medical Research,
London NW7 IAA, England.*Proceedings of Royal Society of London*, **210**,
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H. T. Chang

Institute of Physiology, Peking, China.

Endeavour, **4**, 92 (1980)**R81B156. Opiate activity and receptor selectivity of dynorphin₁₋₁₃ and related peptides.**

M. Wuster, R. Schultz & A. Herz

Max Plank Institute Psychiatry, Dept.
Neuropharmacol, Kraepelinstr 2, D-8000
Munich 40, FRG.*Neuroscience Letters*, **20**, 79 (20 Oct. 80)**R81B157. Opiate receptors and endorphins: their role in anesthesiology.**

R. K. Stoelting

Indiana University, School of Medicine,
Dept. Anesthesia, Indianapolis, IN, 46223,
USA.*Anesthesia and Analgesia*, **59**, 874 (Nov. 80)**R81B158. Peptides as putative excitatory neurotransmitters: carnosine, enkephalin, substance P and TRH.**

R. A. Nicoll, B. E. Alger & C. E. Jahr

University of California San Francisco,
Dept. Pharmacology, San Francisco,
CA, 94143, USA.*Proceedings of the Royal Society of London*,
210, 133 (29 Oct. 80)**R81B159. Peptidergic pathways in the central nervous system.**

M. J. Brownstein

National Institute of Mental Health,
Clinical Science Laboratory, Neuroendo-
crinology Unit, Bethesda, MD, 20205, USA*Proceedings of the Royal Society of London*,
210, 79 (29 Oct. 80)**R81B160. Physiology of nerve growth factor.**

H. Thoenen & Y. A. Barde

Max Plank Institute Psychiatry, Dept.
Neuro-chemistry. D-8000 Munich 40, FRG.*Physiological Reviews*, **60**, 1284 (Oct. 80)

R81B161. Regulation of neuropeptide release.

L. L. Iversen, C. M. Lee, R. F. Gilbert, S. Huntand & P. C. Emson

Medical School of Cambridge, Dept. Pharmacology, MRC Neurochemical Pharmacology Unit, Cambridge CB2 2QD, England.

Proceedings of the Royal Society of London, **210**, 91 (29 Oct. 80).

R81B162. The role of cholinergic supersensitivity in the medical symptoms associated with withdrawal of antipsychotic drugs.

D. J. Luchins, W. J. Freed & R. J. Wyat

St Elizabeths Hosp, National Institute of Medical Health, Division Special Mental Health Research, Clinical Psychopharmacology Laboratory, Washington, DC 20032, USA.

The American J. of Psychiatry, **137**, 1395 (Nov. 80).

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D. D. Mukerji, S. R. Nautiyal & C. R. Prasad

Department of Chemistry, Lucknow University & Department of Pharmacology, C. D. R. I., Lucknow.

Indian Drugs, **18**, 125 (Jan. 81)

C. Cardiovascular System**R81C055. α_1 -and α_2 -vascular adrenoceptors in the dog.**

J. W. Constantine & D. Gunnell

Pfizer Incorporated, Pfizer Central Research, Dept. Pharmacology, Groton, CT, 06340, USA.

European J. of Pharmacology, **66**, 281 (5 Sep. 80)

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N. M. A. Walter, J. A. Whitworth & P. Kincaid-Smith*

Royal Melbourne Hospital, Dept. Nephrology, Melbourne, Victoria 3050, Australia

Clinical and Experimental Pharmacology & Physiology, **7**, 477 (Sep.-Oct. 80)

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J. P. Trzeuakowski & R. Levi

Cornell University, Dept. Pharmacology, New York, N. Y. 10021, USA.

J. of Pharmacology and Experimental Therapeutics, **214**, 629 (Sep. 80).

R81C058. Cardiovascular haemolytic activity of saponins.

R. Banerji, D. Prakash, G. Misra, S. K. Nigam, A. K. Saxena, A. K. Mathur, J. N. Sinha & K. P. Bhargava

National Botanical Research Institute, Lucknow.

Indian Drugs, **18**, 121 (Jan. 1981).

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J. L. Reid & C. Hamilton

University of Glasgow, Stobhill General Hospital, Dept. Materia Medica, Glasgow G21 3UW, Glasgow, Scotland.

J. of Cardiovascular Pharmacology, **2**(Suppl), 5325 (1980)

R81C060. Clonidine-induced diuresis in the rat. Evidence for a renal site of action.

M. Miller

Veterans Administration Hospital Medical Service, Syracuse, NY 13210, USA.

J. of Pharmacology and Experimental Therapeutics, **214**, 608 (Sep. 80)

R81C061. Dopamine acts peripherally on rat tail arteries.

Z. Wiglusz & R. Jedrzejak*

Medical Academy of Gdansk, Faculty of Pharmacy, Institute of Technology & Drug Analysis, Pharmacodynamics & Biopharmacy Laboratory, PL-80416 Gdansk, Poland.

J. of Pharmacy and Pharmacology, **32**, 719 (Oct. 80)

R81C062. A double-blind trial to assess long-term oral anticoagulant therapy in elderly patients after myocardial infarction. Report of the sixty plus reinfarction study research group.

J. Ross

Dept. Internal Medicine, Red Cross Hospital, Sport Paan 600, 2566 M. J. The Hague, The Netherlands.

Lancet, **II**, 989, (8 Nov. 80)

R81C063. The effect of intravenous administration of GABA and brain extracts on blood pressure in the rat.

J. S. Horvath, C. R. Baxter, G. Duggin & D. J. Tiller

Royal Prince Alfred Hospital Renal and Hypertension Units, Camperdown, NSW 2050, Australia.

Clinical and Experimental Pharmacology & Physiology, **7**, 481 (Sep.-Oct. 80)

R81C064. Evidence that endogenous vasopressin plays a protective role in circulatory shock—role for reticuloendothelial system using brattleboro rats.

B. M. Altura

Sunny Downstate Medical Center, Dept. Physiology, Brooklyn, NY 11203, USA.

Experientia, **36**, 1080 (15 Sep. 80)

R81C065. Facilitation of sympathetic transmission by prejunctional β -adrenoceptors in cardiac and vascular tissues.

I. C. Medgett, M. W. McCulloch, M. J. Rand & D. F. Story

University of Melbourne, Dept. Pharmacology, Parkville, Victoria 3052, Australia

Clinical and Experimental Pharmacology & Physiology, **7**, 573 (Sep.-Oct. 80)

R81C066. Guanabenz and hydrochlorothiazide for the treatment of essential hypertension-enhanced renal perfusion.

S. E. Warren, I. M. Cohen, A. P. Barg & D. T. Oconnor*`

Veterans Administration Hospital Medical Center, San Diego, CA, 92161, USA.

Current Therapeutic Research, **28**, 530 (Oct. 80)

R81C067. Impaired renal kallikrein activity and elevated blood pressure normalized by orally applied kallikrein in essential hypertension.

K. O. Stumpe, A. Overlack, C. Ressel & F. Krueck

University of Bonn Medical Kilinik, D-5300 Bonn 1, Federal Republic of Germany.

Agents and Actions, **10**, 349 (Sep. 80)

R81C068. New trends in antiarrhythmic drugs.

P. Duchene-Marullaz

Faculty Medicine Clermontferrand, Medical Pharmacology Laboratory Inserm, F-63001 Clermont Ferrand, France.

Trends in Pharmacological Sciences, **1**, 405 (Oct. 80).

R81C069. Osmoreceptors, vasopressin, and control of renal water excretion.

P. Bie

University Copenhagen, Institute of Medical Physiology, DK.-2200, Copenhagen N, Denmark.

Physiological Reviews, **60**, 961 (Oct. 80)

R81C070. The pharmacology of prazosin, a novel antihypertensive agent.

I. Cavero & A. G. Roach

Syntholab, Laboratory Etud Research Science, Dept. Biology, 58 Rue Glaciere, F-75621 Paris 13, France.

Life Science, **27**, 1525 (27 Oct. 80)

R81C071. Possible mechanisms of a new type of antispasmodic drug, BTM-1042 (Cis-(—)-2, 3-dihydro-3-(4-methyl-piperazinyl) methyl-2-phenyl-1, 5-benzothiazepin-4 (5H)-one dihydrochloride).

I. Takayanagi, K. Nakazo & Y. Kizawa

Toho University School of Pharmaceutical Science, Dept. Chemical Pharmacology, Funabashi, Chiba 274, Japan.

Japanese J. of Pharmacology, **30**, 647 (Oct. 80)

R81C072. The present status of the autoregulation theory of the pathogenesis of hypertension.

P. I. Korner

Baker Medical Research Institute, Commercial Road, Prahran, Victoria 3181, Australia.

Clinical and Experimental Pharmacology & Physiology, **7**, 521 (Sep.-Oct. 80)

R81C073. QSAR in a series of hypotensive-3-substituted 2, 3, 4, 4a, 5, 6-hexahydro-1(H)-pyrazino 1, 2-alquinolines.

A. K. Saxena, V. A. Murthy, (Late)
P. C. Jain, R. C. Srimal & Nityanand*

3047 Lawrence Kirk Road, Memphis,
TN-38128, USA.

Indian J. of Chemistry, **19B**, 879 (Oct. 80)

R81C074. Relationship between pentylenetetrazol-induced seizures and brain pentylenetetrazol levels in mice.

W. D. Yonekawa, H. J. Kupferberg &
D. M. Woodbury

National Institute of Neurological Disorders,
Epilepsy Branch, Building 36, Room
5021, Bethesda, Maryland 20205, USA.

*J. of Pharmacology and Experimental
Therapeutics*, **214**, 589 (Sep. 80)

R81C075. Sodium nitroprusside: approaches towards the elucidation of its mode of action.

V. A. W. Kreye

University of Heidelberg, Institute of
Physiology, 2, D-6900, Heidelberg 1,
Federal Republic of Germany.

Trends in Pharmacological Sciences, **1**, 384
(Oct. 80)

R81C076. Use of impromidine to define specific histamine H-2 effects on gastric secretion, heart rate and blood pressure in conscious dogs.

E. Molina, J. Rentz & B. I. Hirschowitz.*

University of Alabama, Dept. Gastroenterology,
Birmingham, Alabama 35294, USA.

*J. of Pharmacology and Experimental
Therapeutics*, **214**, 483 (Sep. 80)

D. Respiratory System

R81D015. Ipratropium bromide: A review of its pharmacological properties and therapeutic efficacy in asthma and chronic bronchitis.

G. E. Pakes & others

Australasian Drug Information Service,
P. O., Box 34030, Auckland 10, New
Zealand.

Drugs, **20**, 237 (Oct. 80)

R81D016. The pharmacological basis of drug treatment in bronchial asthma.

N. S. Skov & P. Stahl

University of Copenhagen, Department
Pharmacology, DK-2100 Copenhagen O,
Denmark.

Allergy, **35**, 549 (Oct. 80)

E. Gastrointestinal Disorders

R81E015. Current therapy in peptic ulcer.

I. N. Marks

Groote Schuur Hospital Observatory,
Gastrointestinal Clinic, Cape Town,
South Africa

Drugs, **20**, 283 (Oct. 80)

R81E016. Induction of gastric histamine synthesis by H₂-receptor antagonists: Potentiation of their antisecretory activity by histidine decarboxylase inhibitors.

Z. Huszti, K. Pik & R. Frenkl

Institute of Drug Research, Dept. Biochemistry, Budapest, Hungary.

Agents and Actions, **10**, 302 (Sep. 80)

F. Metabolic & Degenerative Disorders

R81F017. The anti-inflammatory activity of marine natural products-6-n-tridecylsalicylic acid, flexibilide and dendalone-3-hydroxybutyrate.

P. J. Buckle, B. A. Baldo & K. M. Taylor

Roche Research Institute, Marine Pharmacology, Dee Why, NSW 2009, Australia

Agents and Actions, **10**, 361 (Sep. 80)

R81F018. Decrease in peritoneal mast cell count in rats with adjuvant arthritis. II. Inhibition by anti-inflammatory and immunosuppressive drugs.

S. Seo

K. Saeki, Okayama University School of Medicine, Dept. Pharmacology, Okayama 700 Japan.

Agents and Actions, **10**, 317 (Sep. 80)

R81F019. Decrease in peritoneal mast cell count in rats with adjuvant arthritis. I. Time course and interstrain difference.

S. Seo, J. Yokoyama & K. Saeki*

Okayama University School of Medicine, Dept. Pharmacology, Okayama 700, Japan

Agents and Actions, **10**, 309 (Sep. 80)

R81F020. Displacement of albumin-bound warfarin by anti-inflammatory agents *in vitro*.

J. C. McElney & P. F. D'arcy

Queens University of Belfast, Centre for Medical Biology, Dept. Pharmacy, Belfast BT9 7BL, Antrim, North Ireland.

J. of Pharmacy and Pharmacology, **32**, 709 (Oct. 80)

R81F021. Endogenous inhibitor of prostaglandin biosynthesis in inflammation.

M. Di. Rosa, F. Capasso & N. Mascolo*

University of Naples, Faculty of Pharmacy, Institute of Experimental Pharmacology, 1-80138, Naples, Italy

Agents and Actions, **10**, 358 (Sep. 80)

G. Infectious Diseases

Viral

R81G002. Investigation of 1979 influenza outbreak caused by types A and B influenza viruses in Pune, India.

B. L. Rao

National Institute of Virology, 20A, Dr. Ambedkar Road, Pune 411 001.

Indian J. of Chest Diseases & Allied Sciences, **22**, 143 (July-Sep. 80)

Bacterial**R81G003. Serum lipids in leprosy.**

Bhushan Kumar & others

Dept. Dermatology, Postgraduate Institute of Medical Education and Research, Chandigarh 160 012.

Leprosy in India, **52**, 433 (July 80)

R81G004 Synthesis and antitubercular activity of some bromo substituted 1, 2-benzisoxazole derivatives.

K. A. Thakar, A. B. Dhumir & B. M. Bhawal

Dept. Chemistry, Marathwada University, Aurangabad 431 004.

Current Science, **49**, 889 (5 Dec. 80)

R81G005. Tuberculosis of the tongue.

N. K. Soni, P. Chatterji & S. K. Nahata

Sardar Patel Medical College & Associated Group of Hospitals, Bikaner (Rajasthan).

Indian J. of Tuberculosis, **XXVIII**, 22 (Jan. 81)

Parasitic**R81G006. Search for potent anthelmintics-part XII: 5-arylidene 3-substituted salicylic acids.**

B. D. Heda, P. V. Khadilkar & S. G. Kaskedikar

Department of Chemistry, Vigyan Bhawan, Indore 452 001.

Indian J. of Pharmaceutical Sciences, **42**, 174 (Nov.-Dec. 80)

R81G007. Synthesis of N-(2-substituted ethyl)-N'-arylpiperazines and their quaternary salts as potential anti hook worm agents.

(Miss) R. Rastogi, S. Sharma* & R. N. Lal

Medicinal Chemistry Division, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Chemistry, **19B**, 1003 (Nov. 80)

Others**R81G008. Antifungal and antibacterial activities of Co (II) chelates of salicylic and substituted salicylic acids.**

B. D. Heda, P. V. Khadilkar & S. G. Kaskedikar

Dept. of Chemistry, Vigyan Bhawan, Indore 452 001.

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Central Drug Research Institute, Lucknow 226 001.

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Department of Preventive & Social Medicine, Armed Forces Medical College, Pune.

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Dept. Psychiatric & Behavioral Science, Nancy Pritzker Laboratory of Behavioral Neurochemistry, Stanford CA, 94305, USA.

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Nigata University School of Medicine, Dept. Pharmacology, Nigata 951, Japan.

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Department of Neurochemistry, Institute of Neurology, London, WC1N 3BG, UK.

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H. R. Cama

Department of Biochemistry, Indian Institute of Science, Bangalore 560 012.

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Hungarian Academy of Sciences, Central Research Institute of Chemistry, H-1025, Budapest 17, Hungary.

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School of Life Sciences, University of Hyderabad, Hyderabad 500 001.

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Shionogi & Co. Ltd., Shionogi Research Laboratory, Fukushima ku, Osaka 553, Japan.

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Ohio State University, College of Pharmacy, Div. Pharmacology, Columbus, Ohio 43210, USA.

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P. C. Waldmeier

Ciba Geigy Ag, Div. Pharmacy, Dept. Forschung, CH-4002 Basel, Switzerland,

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Dept. Microbiology, Lady Hardinge Medical College, New Delhi 110 001.

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Dept. Pharmaceutical Sciences, University of Saugar, Saugar.

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K. K. Ussuf & P. M. Nair

Biochemistry and Food Technology Div.,
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University of Zagreb, Faculty of Phar-
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K. S. M. Sastry, R. N. Thakur & V. R.
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Regional Research Laboratory, Canal
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J. D. Phillipson

University of London, School of Pharmacy,
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Teikoku Hormone Manufacturing Co. Ltd.,
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Dept. Organic Chemistry, Indian Insti-
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University Rome, Istituto Farmacol
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Department of Microbiology, Cancer
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S. Varadarajan

Indian Petrochemicals Corporation
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A. N. Daw†

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W. H. Wagner

Im Paradies 25, D-8993 Nonnenhorn,
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A. H. Bittles

Department of Human Biology, Chelsea
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J. D. Padayatty

Department of Biochemistry, Indian
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Polytechny Institute of New York,
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Department of Chemistry, Ramnarain Ruia College Matunga, Bombay 800 019.

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Cornell University, College of Medicine,
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R & D Centre, Cadila Laboratories,
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Medical School of Cambridge, Dept.
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Biomedical Laboratory, Div. of Veterinary
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H. J. Ehrlein

University of Hohenheim, Institute of
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Quality Control Laboratories, I.D. P. L.
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Huntingdon Research Center, Dept. Inhalation
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Nagasaki University, School of Medicine,
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Dept. Chemistry, Katholieke University, Leuven, Celestijnenlaan 200 F, 3030 Leuven

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University of Wisconsin, Madison, Dept. Chemistry, Madison, WI 53706 USA.

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Drug Research Laboratories, Health Protection Branch, Tunneys Pasture, Ottawa, Ontario K1A 0L2 (Canada).

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Division of Protein Metabolism, Institute for Protein Research, Osaka University, Suita, Osaka 565, Japan.

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Departmentto de Farmacologia y Terapeutica, Facultad de Medicina Autonoma, Arzobispo Morcillo, 4, Madrid 34, Spain.

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E. L. Gilliland, N. Turner & M. L. Steer*

Dept. Surgery, Beth Israel Hospital and Harvard Medical School, Boston, MA 02215, USA.

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C. M. Behrens & J. Ramachandran*

Hormone Research Laboratory, 1088 HSW, University of California, San Francisco, CA 94143, USA.

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New York State Psychiatric Institute,
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Department of Physiology, Faculty of
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J. S. Mondschein & D. W. Schomberg

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Department of Internal Medicine,
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Departments of Pharmacology & Neuro-
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M. J. A. Simpson, A. E. Simpson, J.
Hooley & M. Zunz

MRC Unit on the Development and
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Centro de Estudios Farmacologicos y de
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Steroid Research Laboratory, Department of Medical Chemistry, University of Helsinki, SF-00170 Helsinki 17, Finland.

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R81A039. Mammalian gonadal determination and gametogenesis.

J. W. Gordon & F. H. Ruddle*

Prof. & Chairman, Department of Biology and Prof. Human Genetics, Yale University, New Haven, Connecticut 06511, USA.

Science, **211**, 1265 (20 Mar. 81)

R81A040. Mechanisms of gonadal differentiation.

E. P. Haseltine & S. Ohno

Asstt Prof., Dept. of Obstetrics & Gynecology, and the Department of Pediatrics, Yale University, School of Medicine, New Haven Connecticut 06510, USA.

Science, **211**, 1272 (20 Mar 1981)

R81A041. Naloxone and its possible relationship to fetal endorphin levels and fetal distress.

R. C. Goodlin

Department of Obstetrics and Gynecology, University of Nebraska Medical Center, 42nd and Dewey Ave, Omaha, Nebraska 68105.

American J. of Obstetrics and Gynecology, **139**, 16 (1 Jan. 81)

R81A042. Neural gonadal steroid actions.

B. S. McEwen

Associate Professor, Rockefeller University, New York 10021, USA.

Science, **211**, 1303 (20 Mar. 81)

R81A043. An oestrogen receptor activator protein in rat uterine cytosol.

T. N. R. V. Thampan & J. H. Clark

Department of Cell Biology, Baylor College of Medicine, Houston, Texas 77030, USA.

Nature, **290**, 152 (12 Mar. 81)

B NERVOUS SYSTEM**R81B164. Abnormal maturation of cerebral cortex and behavioral deficit in adult rats after neonatal administration of antibodies to ganglioside.**

E. J. Kasarskis, S. E. Karpiak, M. M. Rapport, R. K. Yu & N. H. Bass

Department of Neurology, University of Kentucky, Albert B. Chandler Medical Center, Lexington KY 40536, USA.

Developmental Brain Research, **1**, 25 (1981)

R81B165. Acetaldehyde concentration in rat blood and brain during the calcium carbimide—ethanol interaction.

D. J. Hoover & J. F. Brien*

Department of Pharmacology, Queen's University, Kingston, Ontario, Canada K7L 3N6.

Canadian J. of Physiology and Pharmacology, **59**, 65 (Jan. 81)

R81B166. Acetylcholinesterase and cholinesterase activities in the mouse cerebellum following misonidazole treatment.

C. Clarke, F. Hobbiger & P. W. Sheldon

Radiobiology Unit, Department of Physics, Institute of Cancer Research, Sutton, Surrey, SM25PX, England.

European J. of Pharmacology, **69**, 209 (16 Jan. 81)

R81B167. Actions of 4-methyl-2-aminopyridine on neuromuscular transmission and contractility of skeletal muscle.

N. Kiloh, A. L. Harvey & W. E. Glover

School of Physiology & Pharmacology, University of New South Wales, P. O. Box 1, Kensington, NSW, 2033 Australia.

European J. of Pharmacology, **70**, 53 (5 Mar. 81)

R81B168. Alterations in brain cholecystokinin receptors after fasting.

A. Saito, J. A. Williams & I. D. Goldfine

Cell Biology Laboratory and Department of Medicine, Mount Zion Hospital & Medical Centre, San Francisco, California 94120, USA.

Nature, **289**, 599 (12 Feb. 81)

R81B169. Alterations in cerebrospinal fluid dopamine metabolites following physostigmine infusion.

K. L. Davis, K. F. Faull, L. E. Hollister, J. D. Barchas, & P. A. Berger

Veterans Administration Medical Centre, 130 West Kingsbridge Road, Bronx, New York, NY 10460, USA.

Psychopharmacology, **72**, 155 (1981)

R81B170. Analgesic properties of the GABA-minetic THIP.

R. C. Hill, R. Maurer, H. H. Buescher & D. Roemer.

Preclinical Research Department, Sandoz Ltd., CH 4002, Basel, Switzerland.

European J. of Pharmacology, **69**, 221 (16 Jan. 81)

R81B171. Ascending endorphin inhibition of distress vocalization.

B. H. Herman & J. Panksepp*

Dept. of Psychology, Bowling Green State University, Bowling Green, Ohio 43403, USA.

Science, **211**, 1060 (6 Mar. 81)

R81B172. ^3H -baclofen and ^3H -GABA bind to bicuculline-insensitive GABA $_{\beta}$ sites in rat brain.

D. R. Hill & N. G. Bowery

Dept. of Pharmacology, St. Thomas's Hospital Medical School, London SE1 7EH, UK.

Nature, **290**, 149 (12 Mar. 81)

R81B173. Biopterin in human brain and urine from controls and parkinsonian patients: application of a new radioimmunoassay.

T. Nagatsu, T. Yamaguchi, T. Kato, T. Sugimoto, S. Matsuura, M. Akino, I. Nagatsu, R. Iizuka & H. Narabayashi

Laboratory of Cell Physiology, Dept. Life Chemistry, Graduate School at Nagatsuta, Tokyo Institute of Technology, Yokohama 227, Japan.

Clinica Chimica Acta, **109**, 305 (5 Feb. 81)

R81B174. Block of acetylcholine-activated ion channels by an uncharged local anaesthetic.

D. G. Ogden, S. A. Siegelbaum & D. Colquhoun

Dept. of Pharmacology, University College London, Gower Street, London WC1E 6BT, UK.

Nature, **289**, 596 (12 Feb. 81)

R81B175. Brain distribution and kinetics of desipramine in the rat.

P. D. Hrdina & T. C. Dubas

Dept. of Pharmacology, Faculty of Health Sciences, School of Medicine, University of Ottawa, Ottawa, Ontario, Canada K1N 9A9.

Canadian J. of Physiology & Pharmacology, **59**, 163 (Feb. 81)

R81B176. Brain norepinephrine, dopamine, and 5-hydroxytryptamine concentration abnormalities and their role in the high seizure susceptibility of epileptic chickens.

D. D. Johnson, A. T. Jaju, L. Ness, J. S. Richardson & R. D. Crawford

Dept. of Pharmacology University of Saskatchewan, Saskatoon, Sask, Canada S7N 0W0.

Canadian J. of Physiology & Pharmacology, **59**, 144 (Feb. 81)

R81B177. Cerebral blood flow and oxygen consumption in the rat brain after lesions of the noradrenergic locus coeruleus system.

N. Dahlgren, O. Lindvall, T. Sakabe, U. Stenevi, & B. K. Siesjö

Laboratory of Experimental Brain Research, E. Blocket, University of Lund, S-22185 Lund, Sweden.

Brain Research, **209**, 11 (23 Mar. 81)

R81B178. Characterization of α -adrenoceptors participating in the central hypotensive and sedative effects of clonidine using yohimbine, rauwolscine and corynanthine.

P. B. M. W. M. Timmermans, A. M. C. Schoop, H. Y. Kwa & P. A. Van Zwieten

Department of Pharmacy, Division of Pharmacotherapy, University of Amsterdam, Plantage Muidergracht 24, 1018 TV Amsterdam, The Netherlands.

European J. of Pharmacology, **70**, 7 (5 Mar. 81)

R81B179. Clonidine analgesia and suppression of operant responding: dissociation of mechanism.

P. E. McCleary & J. D. Leander*

Department of Pharmacology, University of North Carolina, School of Medicine 231-H Chapel Hill, North Carolina 27514, USA.

European J. of Pharmacology, **69**, 63 (5 Jan. 81)

R81B180. Are CNS neurons polyploid? a critical analysis based upon cytophotometric study of the DNA content of cerebellar and olfactory bulbar neurons of the bat.

F. J. Swartz & K. P. Bhatnagar

Dept. of Anatomy, University of Louisville, Health Sciences Center, KY 40292, USA.

Brain Research, **208**, 267 (16 Mar. 81)

R81B181. A comparison of the effects of pentobarbital and diphenylhydantoin on the gaba sensitivity and excitability of adult sensory ganglion cells.

B. W. Connors

Dept. of Neurology, Stanford University School of Medicine, Stanford, California, 94305, USA.

Brain Research, **207**, 357 (2 Mar. 81)

R81B182. A comparison of the neurochemical effects of buprenorphine with those of morphine and haloperidol in rats.

P. W. Dettmar, A. Cowan & D. S. Walter

Department of Pharmacology, Reckitt and Colman, Pharmaceutical Division, Kingston-upon-Hull HU8 7DS, England.

European J. of Pharmacology, **69**, 147 (16 Jan. 81)

R81B183. Contribution of noradrenaline, dopamine and adrenaline-containing axons to the innervation of different regions of the spinal cord of the cat.

S. M. Fleetwood-Walker & J. H. Coote

Department of Physiology, The Medical School, University of Birmingham, UK.

Brain Research, **206**, 95 (9 Feb. 81)

R81B184. Control of enzyme secretion by non-cholinergic, non-adrenergic nerves in guinea pig pancreas.

G. T. Pearson, J. S. Davison, R. C. Collins & O. H. Petersen*

Dept. of Physiology, University of Dundee, Dundee DD1 4HN, UK.

Nature, **290**, 259 (19 Mar. 81)

R81B185. Control of glutaminase activity in rat brain cortex in vitro: influence of glutamate, phosphate, ammonium, calcium and hydrogen ions.

A. M. Benjamin

Division of Neurological Sciences, Dept. of Psychiatry, University of British Columbia, Vancouver, B. C. V6T 1W6, Canada.

Brain Research, **208**, 363 (16 Mar. 81)

R81B186. Co-release of enkephalin and catecholamines from cultured adrenal chromaffin cells.

B. G. Livett, D. M. Dean, L. G. Whelan, S. Udenfriend* & J. Rossier

Roche Institute of Molecular Biology, Nutley, New Jersey 07110, USA.

Nature, **289**, 317 (22 Jan. 81)

R81B187. Correlation of (¹⁴C) Muscimol concentration in rat brain with anticonvulsant activity.

W. D. Mathews, A. P. Intoccia, V. L. Osborne & G. P. Mcafferty

Department of Pharmacology, F-60, Smith Kline and French Laboratories, Philadelphia, PA 19101, USA.

European J. of Pharmacology, **69**, 249 (29 Jan. 81)

R81B188. Corticotropin regulates transsynaptically the activity of septohippocampal cholinergic neurones.

L. J. Botticelli

Addiction Research Foundation, 701 Weich Road, Palo Alto, California 94304, USA.

Nature, **289**, 75 (1/8 Jan. 81)

R81B189. A critical evaluation of the use of toxins from *Dendroaspis viridis* to block nicotinic responses at central and ganglionic synapses.

M. Quik, P. A. Smith, A. L. Padjen & B. Collier

Dept. of Pharmacology, McIntyre Medical Building, McGill University, 3655 Drummond St., Montreal, Quebec H3G 1Y6, Canada.

Brain Research, **209**, 129 (23 Mar. 81)

R81B190. Dendritic release of dopamine in the substantia nigra.

A. Cheramy, V. Leviel & J. Glowinski

Inserm U 114, College de France, 11, Place Marcelin Berthelot, 75231 Paris Cedex 05, France.

Nature, **289**, 537 (12 Feb. 81)

R81B191. Detection of some local anaesthetics in horse urine and plasma by gas-liquid chromatography.

F. T. Delbeke, M. Debackere* & N. Desmet

Laboratorium voor Farmacologie en Toxicologie der Huisdieren, Fakulteit Diergeneeskunde, Rijks-universiteit Gent Casinoplein 24, B 9000 Gent, Belgium.

J. of Chromatography, **206**, 594 (27 Feb. 81)

R81B192. Determination of barbiturates in mouse tissues by high performance liquid chromatography.

K. Koizumi, Y. Kubota, H. Miki & T. Utamura

Faculty of Pharmaceutical Sciences, Mukogawa Women's University, 4-16 Edagawa Nishinomiya 663, Japan.

J. of Chromatography, **205**, 401 (30 Jan. 81)

R81B193. Determination of opiates in biological samples by glass capillary gas chromatography with electron-capture detection.

P. O. Edlund

Dept. of Pharmacology, Central Research & Control Laboratory of the National Corporation of Swedish Pharmacies, Box 3045, S-17103 Solna 3, Sweden.

J. of Chromatography, 206, 109 (6 Feb. 81)

R81B194. Determination of Δ^9 -Tetrahydrocannabinol in pharmaceutical vehicles by high-performance liquid chromatography.

K. P. Flora, J. C. Craddock & J. P. Davignon

Analytical and Product Development Section, Pharmaceutical Resources Branch, National Cancer Institute, Building 37, Room 6D12, National Institute of Health, Bethesda, MD 20205, USA.

J. of Chromatography, 206, 117 (6 Feb. 81)

R81B195. Developmental changes of synapses in the cerebellar cortex of the rat: a quantitative analysis.

O. Robain, I. Bideau & E. Farkas

INSERM U 154, Hospital Saint Vincent de Paul, 75674 Paris Cedex 14, France.

Brain Research, 206, 1 (9 Feb. 81)

R81B196. Development of glutamate binding sites and their regulation by calcium in rat hippocampus.

M. Baudry, D. Arst, M. Oliver & G. Lynch

Dept. Psychobiology, University of California, Irvine, California 92717, USA.

Developmental Brain Research, 1, 37 (1981)

R81B197. Dialysis in schizophrenia: a double-blind evaluation.

S. C. Schulz, D. P. VanKammen*, J. E. Balow, M. W. Flye & W. E. Bunney, Jr.

Biological Psychiatry Branch, National Institute of Mental Health, Bethesda, Maryland 20205, USA.

Science, 211, 1066 (6 Mar. 81)

R81B198. Difference in brain densities between chronic alcoholic and normal control patients.

C. J. Golden, B. Graber, I. Blose, R. Berg, J. Coffman & S. Block

University of Nebraska Medical Center, Omaha 68105.

Science, 211, 508 (30 Jan. 81)

R81B199. Dye transfer through gap junctions between neuroendocrine cells of rat hypothalamus.

R. D. Andrew, B. A. Macvicen, F. E. Dudek & G. I. Hatton

Dept. of Physiology, Tulane University School of Medicine, New Orleans, Louisiana 70112, USA.

Science, 211, 1187 (13 Mar. 81)

R81B200. Dynorphin: a possible modulatory peptide on morphine or β -Endorphin analgesia in mouse.

H. J. Friedman, M. F. Jen, J. K. Chang, N. M. Lee & H. H. Loh

Department of Psychiatry and Langley Porter Psychiatric Institute, University of California, San Francisco, CA 94143, USA.

European J. of Pharmacology, **69**, 357 (29 Jan. 81)

R81B201. The effect of α -bungarotoxin on spontaneous activity in the ventral nerve cord of *Limulus polyphemus*.

W. Thomas & J. G. Townsel

Dept. of Physiology & Biophysics, University of Illinois Medical Center, Chicago IL 60680, USA.

Canadian J. of Physiology & Pharmacology, **59**, 139 (Feb. 81)

R81B202. Effects of corticosteroids on neuromuscular blocking actions of d-Tubocurarine.

R. S. Leeuwijn, R. D. V. Currie, H. V. Wilgenburg & M. Ottenhof

Pharmacological Laboratory, University of Amsterdam, Polderweg 104, Amsterdam, The Netherlands.

European J. of Pharmacology, **69**, 165 (16 Jan. 81)

R81B203. Effects of intraluminal sulfate on electrolyte transfers along the perfused rat nephron.

G. A. Quamme

Department of Medicine, Acute Care Unit, University of British Columbia, Vancouver, B. C., Canada V6T 1W5.

Canadian J. of Physiology & Pharmacology, **59**, 122 (Feb. 81)

R81B204. Effects of isoproterenol on the development of β -adrenergic receptors in brain cell aggregates.

B. B. Wolfe

University of Colorado Health Science Centre, Dept. of Pharmacology, 4200 East Ninth Avenue, Denver, Colorado 80262, USA.

Brain Research, **207**, 174 (23 Feb. 81)

R81B205. Effects of vasopressin on human memory functions.

H. Weingartner, P. Gold, J. C. Ballenger, S. A. Smallberg, R. Summers, D. R. Rubinow, R. M. Post & F. K. Goodwin

National Institute of Mental Health, Bethesda, Maryland 20205, USA.

Science, **211**, 601 (6 Feb. 81)

R81B-06. Endogenous late positive component of the evoked potential in cats corresponding to P300 in humans.

M. B. Wilder, G. R. Farley & A. Starr

Dept. of Neurology, California College of Medicine, University of California, Irvine 92717, USA.

Science, **211**, 605 (6 Feb. 81)

R81B207. Endorphins through the eye of a needle?

Editorial

Lancet, 1, 480 (28 Feb. 81)**R81B208. Enhancement by pyridoxine of the action of diazepam on spinal presynaptic inhibition.**

N. R. Banna, N. E. Saade, C. Salameh & S. J. Jabbur

Comparative Physiology Laboratory, Faculty of Science, Lebanese University, Hadath Beirut and Dept. of Physiology, American University, Beirut, Lebanon.

Experientia, 37, 83 (Jan. 81)**C CARDIOVASCULAR SYSTEM****R81C077. Cardioacceleratory effect of muscarinic blocking agents in the dog.**

H. A. Schuil, J. R. Brunsting*, H. van der Molen & W. G. Zijlstra

Dept. Physiology, University of Groningen, Bloemsingel 10, 9712 KZ Groningen, The Netherlands.

European J. of Pharmacology, 69, 229 (16 Jan. 81)**R81C078. The characterization of cardiac histaminergic chronotropic receptors in the rabbit.**

A. Polanin, T. E. Tenner, Jr. & J. H. McNeill

Division of Pharmacology & Toxicology, Faculty of Pharmaceutical Sciences, University of British Columbia, Vancouver, B. C., Canada V6T 1W5.

Canadian J. of Physiology & Pharmacology, 59, 14 (Jan. 81)**R81C079. Cross-linked fibrinogen dimers demonstrate a feature of the molecular packing in fibrin fibers.**

W. E. Fowler, H. P. Erickson, R. R. Hantgan, J. McDonagh & J. Hermans

Dept. of Anatomy, Duke University Medical Center, Durham, North Carolina 27710.

Science, 211, 287 (16 Jan. 81)**R81C080. Dual-channel self-balancing impedance plethysmograph for vascular studies.**

J. S. Arenson, R. S. C. Cobbold & K. W. Johnston

Institute of Biomedical Engineering Sciences, Technion, Haifa 3200, Israel.

Medical & Biological Engineering & Computing, 19, 157 (Mar. 81)**R81C081. Effect of non-steroid anti-inflammatory drugs in experimental myocardial infarction in rats.**

I. Lepran, M. Koltai & L. Szekeres

Dept. of Pharmacology, University Medical School of Szeged, P. O. Box 11 H-6701 Szeged, Hungary.

European J. of Pharmacology, 69, 235 (16 Jan. 81)

R81C082. Effects in conscious dogs of ajmaline, propranolol, amiodarone and verapamil on right ventricular nodal strength interval curves.

J. Lapalus, J. P. Camous*, D. Crenesse, J. Varenne & J. B. Guiran

Clinique Cardiologique, Hospital Pasteur, 06031 Nice, France.

European J. of Pharmacology, **69**, 189 (16 Jan. 81)

R81C083. Essential hypertension: central and peripheral norepinephrine.

J. R. Lake, H. G. Gullner, R. J. Polinsky, M. H. Ebert, M. G. Ziegler & F. C. Bartter

Dept. Psychiatry & Pharmacology, Uniformed Services University of the Health Sciences, School of Medicine, Bethesda, Maryland, 20014, USA.

Science, **211**, 955 (27 Feb. 81)

R81C084. Fluorocarbons reduce myocardial ischemic damage after coronary occlusion.

D. H. Glogar, R. A. Kloner*, J. Muller, J. W. V. DeBoer, E. Braunwald, & L. C. Clark, Jr.

Harvard Medical School, 180 Longwood Avenue, Room 235, Boston, Mass, 02115, USA.

Science, **211**, 1439 (27 Mar. 81)

R81C085. High-performance liquid chromatographic analyses of the antihypertensive drug captopril.

S. Perlman & J. Kirschbaum

Squibb Institute for Medical Research, New Brunswick, NJ 08903, USA.

J. of Chromatography, **206**, 311 (20 Feb. 81)

R81C086. The hypotensive effect of centrally administered neutrotensin in rats.

F. Rioux, R. Quirion, S. St Pierre, D. Regoli, F. B. Jolicœur, F. Belanger & A. Barbeau

Department of Physiology & Pharmacology, Faculty of Medicine, University of Sherbrooke, Sherbrooke, Quebec, Canada J1H 5N4.

European J. of Pharmacology, **69**, 241 (29 Jan. 81)

RESPIRATORY SYSTEM

R81D017. Protein synthesis by human fetal lung.

D. Genbacev, B. Cemerikic, M. Movsesian & V. Sulovic

University of Belgrade, Institute for the Application of Nuclear Energy in Agri-

culture, Veterinary Medicine and Forestry, 11080 Zemun, Banatska 31B, Yugoslavia.

American J. of Obstetrics and Gynecology, **139**, 41 (1 Jan 81)

E GASTROINTESTINAL DISORDERS

R81E017. Association of glycoproteins and pepsinogen in the secretory granules of fundic epithelial cells isolated from guinea pig stomach.

D. Bouhours, J. F. Bouhours & P. A. Bryon

Laboratoire de Biologie et Technologie des Membranes du C. N. R. S. Université Claude-Bernard de Lyon, 43 Bd 11 November 1918, Villeurbanne 69622 Cedex, France.

Biochimica et Biophysica Acta, 672, 288 (5 Feb. 81).

R81E018. Cell-free synthesis and processing of multiple precursors to gultcagon.

D. Shields, T. G. Warren, S. E. Roth & M. J. Brenner

Department of Anatomy, Albert Einstein College of Medicine, 1300 Morris Park Anenue, Bronx, N. Y. 10461 USA.

Nature, 289, 511 (5 Feb. 81)

R81E019. Composition of oral solutions prepared by Jamaican mothers for treatment of diarrhoea.

P. S. E. G. Harland, D. L. Cox, M. Lyew & F. Lindo

Department of Child Health, University of The West Indies, Mona, Kingston 7, Jamaica.

Lancet, I, 600 (14 Mar. 81)

R81E020. Detection of a milk factor that facilitates folate uptake by intestinal cells.

N. Colman, N. Hettiarachchy & V. Herbert

Veterans Administration Medical Center, Bronx, New York 10468 USA.

Science, 211, 1427 (27 Mar. 81).

R81E021. Effects of gestation and lactation on rat gastric fundus.

L. Jolicoeur, J. Asselin & J. Morrisset

Gastrointestinal Research Unit, Department of Biology, Sciences Faculty, Sherbrooke University, Sherbrooke, P. Q. Canada J1K 2R1.

Canadian J. Physiology & Pharmacology, 59, 96 (Feb. 81)

F METABOLIC AND DEGENERATIVE DISORDERS

R81F022. Aspirin prevention of cholesterol gallstone formation in prairie dogs.

S. P. Lee, M. C. Carey & J. T. La Mont

Section of Gastroenterology, Auckland Hospital, Park Road, Auckland 1, New Zealand.

Science, 211, 1429 (27 Mar. 81)

R81F023. Body weight and composition in laboratory rats: effects of diets with high or low protein concentrations.

Donald, G. C. Pitts & S. L. Pohl

Department of Internal Medicine, University of Virginia, Charlottesville 22908, USA.

Science, **211**, 185 (9 Jan. 81).

R81F024. A chance observation of oriented diffraction from low-density serum lipoprotein.

E. Blaurock

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Biochimica et Biophysica Acta, **663**, 203 (26 Jan. 81)

R81F025. Cimetidine is unlikely to increase formation of intragastric nitroso-compounds in patients taking a normal diet.

J. Muscroft, D. Youngs, D. W. Burdon, M. R. B. Keighley*

General Hospital, Steelhouse Lane, Birmingham B 4 6NH, UK.

Lancet, **I**, 408 (21 Feb. 81)

R81F026. Comparison of metastatic effect, cell uptake and tubulin-binding activity of colchicine and colcemid.

S. Serpinskaya, V. I. Gelfand & B. P. Popnin

A. N. Belozersky Laboratory of Molecular Biology and Bioorganic Chemistry, Moscow State University, Moscow 117234, USSR.

Biochimica et Biophysica Acta, **673**, 86, (18 Feb. 81).

R81F027. Conformation of insulin and its fragments in surfactant solutions.

C. S. C. Wu & J. T. Yang*

Department of Biochemistry and Biophysics, University of California, San Francisco, CA 94143 (U.S.A.)

Biochimica et Biophysica Acta, **667**, 285 (27 Feb. 81)

R81F028. Degradation of the peroxisome-associated polypeptide in clofibrate-treated mouse liver.

T. Watanabe & T. Suga

Department of Clinical Biochemistry, Tokyo College of Pharmacy, Horinouchi 1432-1, Hachioji, Tokyo 192-03, Japan.

FEBS Letters, **124**, 159 (23 Feb. 81)

R81F029. Different influences of two types of diets commonly used for rats on a series of parameters related to the metabolism of central serotonin and noradrenaline.

O. Heroux & A. G. Roberge

Environmental Physiology Group, Division of Biological Sciences, National Research Council of Canada, Ottawa, Ontario Canada KIAOR-6.

Canadian J. of Physiology & Pharmacology, **59**, 108 (Feb. 81).

R81F030. Direct measurement of neutral collagenase activity in homogenates from baboon and human liver.

K. Maruyama, L. Feinman*, I. Okazaki & C. S. Lieber.

Laboratory of Liver Disease & Nutrition, Bronx Veterans Administration Hospital, Bronx, NY 10468, USA.

Biochimica et Biophysica Acta, 658, 124 (13 Mar. 81)

R81F031. An effect of colchicine on galactosyl and sialyltransferases of rat liver golgi membranes.

M. M. Mitranic, J. M. Boggs & M. A. Moscarello.

The Department of Biochemistry, The Research Institute, The Hospital for Sick Children, Toronto, Ontario, Canada.

Biochimica et Biophysica Acta, 672, 57 (7 Jan. 81)

R81F032. Effect of endogenous insulin release on fetal alanine concentration and uptake.

A. F. Philipps, J. W. Dubin & J. R. Raye

Department of Pediatrics, The University of Connecticut, Health Center, Farmington Connecticut, 06032, USA.

American J. of Obstetrics & Gynecology, 139, 22 (1 Jan. 81)

R81F033. The effect of rectal administration of insulin on the shortterm treatment of alloxan-diabetic dogs.

Y. Yamasaki, M. Shichiri*, R. Kawamori, T. Morishima, N. Hakui, T. Yagi & H. Abe.

First Department of Medicine, Osaka University Medical School, 1-1-50 Fukushima, Fukushima-Ku, Osaka, Japan 553.

Canadian J. of Physiology & Pharmacology, 59, 1, (Jan. 81).

R81F034. Elevation of serum β_2 microglobulin in liver diseases.

S. Beorchia, C. Vincent, J. P. Revillard* & C. Treppe

Hospital E. Herriot-Pav. P, 69374 Lyon Cedex 2, France.

Clinica Chimica Acta, 109, 245 (5 Feb. 81)

R81F035. Evidence for phosphorylation and activation of acetyl CoA carboxylase by a membrane-associated cyclic AMP-independent protein kinase, relationship to the activation of acetyl CoA carboxylase by insulin.

R. W. Brownsey, G. J. Belsham & R. M. Denton

Department of Biochemistry, University of Bristol Medical School, University Walk Bristol BS8 1TD, England.

FEBS Letters, 124, 145 (23 Feb. 81)

R81F036. Evidence of environmental influence on the development of thermoregulation in the rat.

A. V. Ferguson, W. L. Veale, & K. F. Cooper

Division of Medical Physiology, Faculty of Medicine, University of Calgary, Alberta Canada T2N1N4.

Canadian J. of Physiology & Pharmacology, 59, 91 (Feb. 81)

R81F037. Fetal macrosomia in experimental maternal diabetes.

S. Kim, Y. J. Yoon, I. Jatoi & Y. Kim

Department of Pharmacology, St. Louis University School of Medicine, St. Louis, Missouri-63140. USA.

American J. of Obstetrics & Gynecology, **139**, (1 Jan. 81)

R81F038. Gastric anti-ulcer activity of (+)-cyanidanol-3, α -histidine decarboxylase inhibitor.

S. Parmar & M. N. Ghosh

Department of Pharmacology, Jawaharlal Institute of Postgraduate Medical Education & Research, Pondichary-605 006, India.

European J. of Pharmacology, **69**, 25 (5 Jan. 81)

R81F039. Granuloma formation in rat liver after hepatic vein ligation.

J. Weinbren, S. Mason & S. Sen

Royal Postgraduate Medical School, Guy's Road, London W 12 OHS, England.

Experientia, **37**, 77 (Jan. 81)

R81F040. High-density lipoprotein.

Editorial

Lancet, **I**, 478 (28 Feb. 81)

R81F041. High-fibre diets & diabetes.

Editorial

Lancet, **I**, 423 (21 Feb. 81)

R81F042. High-performance liquid chromatographic analysis of egg yolk phospholipids.

V. L. Hanson, J. Y. Park, T. W. Osborn* & R. M. Kiral

Pharmaceutical Research Department, American McGaw, Irvine, CA 92714 (USA).

J. of Chromatography, **205**, 393, (30 Jan. 81)

R81F043. Immunochemistry of human plasma apolipoprotein C-II as studied by radioimmunoassay.

S. I. Barr, B. A. Kottke, J. Y. Chang & S. J. T. Mao

Cardiovascular Research Unit, Mayo Clinic and Foundation, Rochester, MN55901 (U.S.A.).

Biochimica et Biophysica Acta, **663**, 491 (23 Feb. 81)

ANTINEOPLASTIC AGENTS

R81H001. Can dietary beta-carotene materially reduce human cancer rates?

J. Peto, R. Doll, J. D. Buckley & M. B. Sporn

Imperial Cancer Research Fund, Cancer Studies Unit, Nuffield Dept. of Clinical Medicine, Radcliffe Infirmary, Oxford OX 26 HE, U. K.

Nature, **290**, 201 (19 Mar. 81)

R81H002. Exposure of newborn rats to pharmacologically active compound may permanently alter carcinogen metabolism.

R. A. Faris & T. C. Campbell

Division of Nutritional Sciences. Cornell University, Ithaca, New York 14853, USA.

Science, **211**, 719 (13 Feb. 81)

R81H003. Guanosine-5'-phosphate synthetase Guanosine-5'-phosphate kinase in rat hepatomas and kidney tumors.

T. J. Borizki, R. C. Jackson, H. P. Morris & Weber

Laboratory for Experimental Oncology, Indiana University School of Medicine, Indianapolis, IN 46223, USA.

Biochimica et Biophysica Acta, **658**, 102 (Mar. 81)

R81H004. Insulin as a potent, specific growth factor in a rat hepatoma cell line.

J. W. Koontz & M. Iwahashi

Dept. Pharmacology, University of Colorado Health Sciences Center, Denver 80262, USA.

Science, **211**, 947 (27 Feb. 81)

R81H005. An investigation of the antitumor activity of *Sesbania drummondii*.

R. G. Powell & C. R. Smith, Jr.

Northern Regional Research Centre, Agricultural Research, Science and Education Administration, U. S. Department of Agriculture, Peoria, Illinois 61604, USA.

J. of Natural Products, **44**, 86 (Jan.-Feb. 81)

R81H006. The origin of human cancers.

J. Cairns

Harvard School of Public Health, 665 Huntington Avenue, Boston, Massachusetts 02115, USA.

Nature, **289**, 353 (29 Jan. 81)

I BIOCHEMICAL PHARMACOLOGY

R81H020. Biosynthetic pathway of 2-deoxystreptamine.

T. Fujiwara & E. Kondo

Shionogi Research Laboratories, Shionogi & Co. Ltd. Fukushima-ku, Osaka 553, Japan.

J. of Antibiotics, **34**, 13, (Jan. 81)

R81H021. Clones of helper T cells mediate antigen-specific, H-2-restricted DTH.

A. T. J. Bianchi, H. Hooijkaas, R. Benner, R. Tess, A. A. Nordin & M. H. Schreier.

Department of Cell Biology & Genetics, Erasmus University, P. O. Box 1738, 3000 DR Rotterdam, The Netherlands.

Nature, **290**, 62, (5 Mar. 81).

R81I022. Comparative studies of human alkaline phosphatases from five human tissues.

A. Stinson & L. E. Seargeant.

Division of Clinical Pathology, Department of Pathology, University of Alberta, Edmonton, Alberta, Canada T6G 2G3.

Biochimica Chimica Acta, **110**, 261 (5 Mar. 81)

R81I023. Compartmentalization of cyclic AMP during phagocytosis by human neutrophilic granulocytes.

B. Pryzwansky, A. L. Steiner, J. K. Bitznagel & C. L. Kapoor

Department of Bacteriology and Immunology, University of North Carolina, Chapel Hill 27514, USA.

Science, **211**, 407 (23 Jan. 81)

R81I024. Control of energy transformation in mitochondria analysis by quantitative model.

J. Bohnensack

Institute for Physiologische Chemie Medizinische Akademie DDR 301, Magdeburg German Democratic Republic

Biochimica et Biophysica Acta, **634**, 203, (Jan. 81)

R81I025. The effect of guanosine nucleotides on [3H] sulpiride binding to rat striatal membranes.

B. Freedman, J. A. Poat & G. N. Woodruff*

Department of Physiology, University of Southampton, Southampton SO9-3TU, England.

European J. of Pharmacology, **69**, 117 (5 Jan. 81)

R81I026. Effect of polyamines on purified poly (ADP-ribose) synthetase from rat liver nuclei.

M. Kawamura, Y. Tanigawa, A. Kitamura, Y. Miyake & M. Shimoyama*

Department of Biochemistry, Shimane Medical University, Izumo 693, Japan.

Biochimica et Biophysica Acta, **652**, 121 (29 Jan. 81)

R81I027. Evaluation of the specific dicyclo-hexylcarbodiimide binding sites in brown adipose tissue mitochondria.

P. Svoboda, J. Houstek, J. Kopecky & Z. Drahota

Institute of Physiology, Czechoslovak Academy of Science, Videnska 1083, Prague 4, Czechoslovakia.

Biochimica et Biophysica Acta, **634**, 321 (12 Feb. 81)

R81I028. Human erythrocyte membranes exhibit a cooperative calmodulin-dependent Ca^{2+} —ATPase of high calcium sensitivity.

P. Downes & R. H. Michell

Department of Biochemistry, University of Birmingham, P. O. Box 363, Birmingham B15 2TT, U.K.

Nature, **290**, 270 (19 Mar. 81)

J MOLECULAR BIOLOGY

R81J008. A carbohydrate signal for intracellular transit.

M. Gelsow

National Institute for Medical Research,
Mill, Hill London, UK.

Nature, 290, 15 (5 Mar. 81)

R81J009. Deoxyribonucleic acid structure: a new model.

R. C. Hopkins

University of Houston at Clear Lake
City, Houston, Texas 77058, USA.

Science, 211, 289 (16 Jan. 81)

R81J010. Direct observation by NMR of two coexisting conformations of an enzyme-ligand complex in solution.

A. Gronenborn, B. Birdsall, E. I. Hyde,
G. C. K. Roberts*, J. Feeney & A. S. V.
Burgen

Division of Molecular Pharmacology,
National Institute for Medical Research,
London NW 7 1AA, UK.

Nature, 290, 273 (19 Mar. 81)

R81J011. The *E. coli* β -lactamase attenuator mediates growth rate-dependent regulation.

B. Jaurin, T. Grundstrom, T. Edlund &
S. Normark

Department of Microbiology, University
of Umea, S-90187 Umea, Sweden.

Nature, 290, 221 (19 Mar. 81)

R81J012. A gene chimaera of Sv and mouse β -globin is transcribed and properly spliced.

G. Chu & P. A. Sharp

Center for Cancer Research and Department of Biology, Massachusetts Institute of Technology, Cambridge, Massachusetts, USA.

Nature, 289, 378 (22 Jan. 81)

R81J013. Gene expressions in eukaryotes.

D. D. Brown

Department of Embryology, Carnegie Institution of Washington, 115 W. University Parkway, Baltimore, Maryland 21210, USA.

Science, 211, 667 (13 Feb. 81)

R81J014. Homologous pairing occurs before DNA strand separation in general genetic recombination.

S. C. West, E. Cassuto & P. Howarth
Flanders

Department of Molecular Biophysics and Biochemistry, Yale University, P. O. Box 6666, New Haven, Connecticut 06511 USA.

Nature, 290, 29 (5 Mar. 81)

J015. Homology and concerted evolution at the $\alpha 1$ and $\alpha 2$ loci of human α -globin.

A. Liebhaber, M. Goessens & Y. W.

Howard Hughes Medical Institute Laboratory and Department of Medicine, University of California, San Francisco, California 94143, USA.

Nature, **290**, 26 (5 Mar. 81)

J016. A human quantitative polymorphism related to Xg blood groups.

N. Goodfellow

Imperial Cancer Research Fund Lincoln's Inn Fields, London WC 2A 3BX UK.

Nature, **289**, 404 (29 Jan. 81)

J017. Identification of mutations affecting replication control of plasmid pDF 13.

R. Suitje, C. E. Spelt, E. Veltkamp & J. J. Nijkamp

Department of Genetics, Biological Laboratory, Vrije Universiteit, De Boelelaan 1087, 1007 MC Amsterdam, The Netherlands.

Nature, **290**, 264 (19 Mar. 81)

J018. Influence of pyridoxal 5-phosphate on the DNA binding activity of steroid hormone receptors and other DNA binding proteins.

M. Westphal & N. Beato

Physiologisch-Chemisches Institut, der Philipps-Universität, Deutschhausstr. 1-2, 3550 Marburg, Federal Republic of Germany.

FEBS Letters, **124**, 189 (23 Feb. 81)

R81J019. Interferon action-sequence specificity of the ppp (A2'p)_n A-dependent ribonuclease.

D. H. Wreschner, J. W. McCauley, J. J. Skehel & I. M. Kerr

Department of Microbiology, Tel Aviv University, Ramat Aviv, Israel.

Nature, **289**, 414 (29 Jan. 81)

R81J020. Intrachromosomal gene conversion in yeast.

H. L. Klein & T. D. Petes

Department of Microbiology, The University of Chicago, 920 East 58th Street, Chicago, Illinois 60639, USA.

Nature, **289**, 144 (15 Jan. 81)

R81J021. Isolation of a gene from *Drosophila* by complementation in yeast.

S. Henikoff, K. Tatchell, B. D. Hall & K. A. Nasmyth

Department of Zoology, University of Washington, Seattle, Washington, 98195, USA.

Nature, **289**, 33 (1/8 Jan. 81)

R81J022. Left-handed double helical DNA: variations in the backbone conformation.

A. H. J. Wang, G. J. Quigley, F. J. Kolpak, G. van der Marel, J. H. van Boom, & A. Rich

Department of Biology, Massachusetts Institute of Technology, Cambridge 02139, MA, USA.

Science, **211**, 171 (9 Jan 81)

R81J023. Metal chelate affinity chromatography II group separation of mono-and dinucleotides.

P. Hubert

Laboratoire de Chimie-Physique Macromoléculaire, ENSIC, University de Nancy, 1, rue Grandville 54000 Nancy, France.

J. of Chromatography, **206**, 164 (6 Feb. 81)

R81J024. A model from electron microscopy for the molecular structure of fibrinogen and fibrin.

J. W. Weisel, G. N. Phillips Jr. & C. Cohen

Rosenstiel Basic Medical Sciences Research Centre, Brandeis University, Waltham, Massachusetts 02254, USA.

Nature, **289**, 263 (22 Jan. 81)

R81J025. Molecular basis for mild forms of homozygous beta-thalassaemia.

D. J. Weatherall, L. Pressley, W. G. Wood, D. R. Higgs, & J. B. Clegg

Nuffield Department of Clinical Medicine, John Radcliffe Hospital, Headington, Oxford OX3 9DU, UK.

Lancet, **1**, 527 (7 Mar. 81)

R81J026. Molecular cloning of the K1 capsular polysaccharide genes of *E. coli*.

R. P. Silver, C. W. Finn, W. F. Vann, W. Aaronson, R. Schneerson, P. J. Kretschmer & C. F. Garon

Division of Bacterial Products, Bureau of Biologics, FDA, Bethesda, Maryland 20205, USA.

Nature, **289**, 696 (19 Feb. 81)

R81J027. Monoclonal anti-Fc receptor IgG blocks antibody enhancement of viral replication in macrophages.

J. S. M. Peiris, S. Gordon, J. C. Unkeless & J. S. Porterfield

Sir William Dunn School of Pathology, University of Oxford, Oxford OX13RF, UK.

Nature, **289**, 189 (15 Jan. 81)

R81J028. Mutagenicity of fly ash particles in paramecium.

J. Smith-Sonneborn, R. A. Palizzi, C. Herr & G. L. Fisher

Department of Zoology & Physiology, University of Wyoming, Laramie 82701, USA.

Science, **211**, 180 (9 Jan. 81)

R81J029. A new understanding of sickle cell emerges : X-ray kinetic studies paint a comprehensive picture of sickle cell disease to the level of atomic interactions.

H. Maugh II*

Nature, **211**, 265 (16 Jan. 81)

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J. Hogan, D. Wemmer, R. P. Bray, N. Made-Jardetzky & O. Jardetzky

Stanford Magnetic Resonance Laboratory,
Stanford University, Stanford, CA 94305,
U.S.A.

NBS Letters, **124**, 202 (23 Feb. 81)

R81J031. Ordering of mouse immunoglobulin heavy chain genes by molecular cloning.

K. Shimizu, N. Takahashi, Y. Y. Kataoka, Y. Nishida, T. Kataoka & T. Honjo

Department of Genetics, Osaka University Medical School, Kitaku, Osaka 530, Japan.

Nature, **289**, 149 (15 Jan. 81)

R81J032. A plasmid DNA primase active in discontinuous bacterial DNA replication.

J. M. Wilkins, G. J. Boulnois & E. Lanka

*Address not available.

Department of Genetics, University of Leicester, Leicester LE 1 7RH, UK.

Nature, **290**, 217 (19 Mar. 81)

R81J033. Plasmid R1 DNA replication dependent on protein synthesis in cell-free extracts of *E. coli*.

R. Diaz, K. Nordström & W. L. Staudenbauer

Department of Molecular Biology, Odense University, DK-5230 Odense M, Denmark.

Nature, **289**, 326 (22 Jan. 81)

R81J034. Production of an aromatic amino acid auxotroph of a trimethoprim-resistant *Escherichia coli* and deuteration of the aromatic amino acids in its dihydrofolate reductase.

J. Florance & C. L. Ginther

Department of Biophysics and Development Microbiology, Merck Institute for Therapeutics Research, Merck Sharp and Dohme Research Laboratories, P. O. Box 2000, Rahway, NJ 07065 (U.S.A.).

Biochimica et Biophysica Acta, **672**, 207 (21 Jan. 82)

R81J035. A protein called immatourin controlling sexual immaturity in *Paramecium*.

N. Haga & K. Hiwatashi

Biological Institute, Tohoku University Aoba-Yama, Sendai 980, Japan.

Nature, **289**, 177 (15 Jan. 81)

R81J036. Reactivation of an inactive human x chromosome: evidence for x inactivation by DNA methylation.

T. Mohandas, R. S. Sparkes & L.J. Shapiro

Division of Medical Genetics, Department of Pediatrics, Harbor-University of California Medical Center, Torrance 90905, USA.

Science, **211**, 293 (23 Jan 81)

R81J037. RNA polymerase: a model for rotational translocation.

D. Dennis, & J. F. Sylvester

Department of Chemistry, University of Delaware, Newark, DE 19711, USA.

FEBS Letters, **124**, 135 (23 Feb. 81)

K PHARMACEUTICS

R81K007. Analysis of some tryptophan and phenylalanine metabolites in urine by a straight-phase high-performance liquid chromatographic technique.

M. Ghebregzabher, S. Rufini, M. G. Castellucci & M. Lato*

Istituto di Clinica Pediatrica della Università degli Studi di Perugia 06100, Italy.

J. of Chromatography, **222**, 191 (13 Feb. 81)

R81K008. Analysis of urinary metanephrines by reversed-phase high-performance liquid chromatography and electrochemical detection.

L. M. Bertani-Dziedzic, A. M. Kristulovic S. W. Dziedzic, S. E. Gitlow & S. Cerqueira

Department of Medicine, Mount Sinai School of Medicine of the City University of New York, 100th Street and Fifth Avenue, New York, N. Y. 10029 (U.S.A.)

Clinica Chimica Acta, **110**, 1 (19 Feb. 81)

R81K009. Analytical and preparative mapping of complex peptide mixtures by reversed-phase high-performance liquid chromatography.

P. Bohlen & G. Kleeman

Laboratories for Neuroendocrinology, Salk Institute for Biological Studies, La Jolla, C. A. 92037 (U.S.A.)

J. of Chromatography, **205**, 65 (23 Jan. 81)

R81K010. Analytical and preparative methods for polymyxin antibiotics using high-performance liquid chromatography with a porous styrene-divinylbenzene copolymer packing.

Y. Kimura, H. Kitamura, T. Araki, K. Noguchi & M. Baba

Faculty of Pharmaceutical Science, Mukogawa Women's University, 4-1 Edagawa-cho. Nishinomiya 663, Japan.

J. of Chromatography, **206**, 563 (2 Feb. 81)

K011. Carbamyl analogs of phosphatidylcholines synthesis, interaction with phospholipases and permeability behavior of their liposomes.

M. Gupta & A. Bali

Division of Biophysics, Central Drug Research Institute, Lucknow 226 001 India.

Biochimica et Biophysica Acta, **663**, 506 (23 Feb. 81)

K012. Clinical aspects of drug usage 13. Dermatology.

A. D. Griffiths

Consultant Dermatologist, St. John's Hospital for diseases of the skin, London, K.

Pharmaceutical J. **226**, 251 (7 Mar. 81).

K013. Chemical modifications of the tetracycline series.

Valcavi

Istituto Biochimico Italiano, Via G. Lorenzini 2 Milano, Italy.

J. of Antibiotics, **34**, 31 (Jan. 81)

K014. Circular dichroism of morphines.

Ringdahl, R. P. K. Chan, J. C. Craig, P. Cava & M. Shamma.

Department of Pharmaceutical Chemistry School of Pharmacy, University of California, San Francisco, CA 94143, USA.

J. of Natural Products, **44**, 80 (Jan.-Feb. 81)

R81K015. Crystal and molecular structure of a pentagonal dodecahedrane.

L. A. Paquette, D. W. Balogh, R. Usha, D. Kountz & G. G. Christoph

Evans Chemical Laboratories, Ohio State University, Columbus 43210, USA.

Science, **211**, 575 (6 Feb. 81)

R81K016. Determination of D-penicillamine in serum by fluorescence derivatization and liquid column chromatography.

E. P. Lankmayz, K. W. Budna & K. Muller

Institute for Analytical Chemistry, Micro and Radiochemistry, Technical University, Graz, Austria.

J. of Chromatography, **222**, 249 (2 Feb. 81).

R81K017. Effect of liposomes containing cholesterol on a hepatic cholesterol-7 α -hydroxylase and drug oxidation system.

G. Deliconstantinos

Department of Physiology, University of Athens Medical School, Athens 609, Greece

Experientia, **37**, 81 (Jan. 81)

R81K019. Enzyme immunoassay of prostaglandin F_{1 α} .

Y. Hayashi, T. Yano & S. Yamamoto

Department of Biochemistry, Tokushima University School of Medicine, Kuramoto-cho, Tokushima, Japan.

Biochimica et Biophysica Acta, **663**, 661 (23 Mar. 81)

R81K020. Glass capillary reaction loops for detection of alcohols aldehydes and ketones by subtraction.

P. Kolo

Department of General Chemistry, University of Helsinki, SF-00710 Helsinki 71, Finland.

J. of Chromatography, 205, 39 (23 Jan. 81)

R81K021. High-performance liquid chromatographic method for the determination of L-ascorbic acid and D-isoascorbic acid.

J. Geigert, D. S. Hirano & S. L. Neidleman

Cetus Corporation, 600 Bancroft Way, Berkeley, CA 94710 (USA).

J. Chromatography, 206, 396 (20 Feb. 81)

R81K022. High-performance liquid chromatography of ecdysteroids and their 3-epi, 3 dehydro and 26-hydro derivatives.

L. N. Dinan, P. L. Donnaney, H. Rees* & T. W. Goodwin

Department of Biochemistry, University of Liverpool, P. O. Box 147 L 69 3 Great Britain.

J. of Chromatography, 205, 139 (23 Jan. 81)

L NATURAL PRODUCTS

R81L010. Alkaloid patterns of cell suspension cultures and differentiated plants of *Baptisia australis* and their biogenetic implications.

M. Wink, T. Hartmann, L. Witte & H. M. Schiebel

Institut für Pharmazeutische Biologie der Technischen Universität, D-3300 Braunschweig, West Germany.

J. of Natural Products, 44, 14 (Jan.-Feb. 81)

R81L011. The alkaloids of *Podopetalum ormondii*.

S. McLean, R. Misra, V. Kumar & J. A. Lamberton

Dept. Chemistry, University of Toronto, Toronto, Ontario, Canada M5S 1A1.

Canadian J of Chemistry, 59, 34 (1 Jan. 81)

R81L012. Alkaloids of *Thalictrum foliolosum*.

S. K. Chattopadhyay, A. B. Ray, D. Slatkin, J. E. Knapp & P. L. Schiff J

Dept. Pharmacognosy, School of Pharmacy, University of Pittsburgh, Pittsburgh PA 15261, USA.

J. of Natural Products, 44, 45 (Jan.-Feb. 81)

R81L013. Anabaseine: venom alkaloid of *Aphaenogaster* ants.

J. W. Wheeler, O. Olubajo, C. B. Stoltz & R. M. Duffield

Dept. Chemistry, Howard University, Washington, D. C. 20059, USA.

Science, 211, 1051 (6 Mar. 81)

**L014. Biosynthesis of the quino-
dine alkaloids: incorporation of Δ^2 -
eridine into matrine.**

T. Leeper, G. Grue-Sorensen & I. D.
nser

Chemistry, University of Cambridge,
Cambridge, England.

Canadian J. of Chemistry, **59**, 106 (1 Jan.

**L015. Chemical conversion of
thramycin 11-methyl ether to dide-
hydroanthramycin and its
utilization in studies of the biosyn-
thesis and mechanism of action of
thramycin.**

K. Malhotra, J. M. Ostrander, L. H.
rley, A. G. McInnes, D. G. Smith,
A. Walter & J. L. C. Wright

College of Pharmacy, University of
Kentucky, Lexington, Kentucky 40506,
A.

J. of Natural Products, **44**, 38 (Jan.-Feb.

**L016. Chemotaxonomic study of
neutral coumarins in roots of citrus
and poncirus by thin-layer, gas-liquid
and high performance liquid chro-
matographic analysis.**

E. Nordby

Citrus and Subtropical Products
Laboratory, Southern Region, US
Dept. of Agriculture, Science and Educa-
tion, Administration. P. O. Box 1909,
Winter Haven, FL 33880, USA.

J. of Chromatography, **207**, 21 (6 Mar. 81)

**R81L017. Constituents of *Cannabis
sativa*. XIX: isolation and structure
elucidation of cannabiglendol, a novel
cannabinoid from an Indian variant.**

C. E. Turner, M. L. Mole, L. Hanus &
& H. N. Elsohly

Research Institute of Pharmaceutical
Sciences, School of Pharmacy, The
University of Mississippi, Mississippi
38677, USA.

J. of Natural Products, **44**, 27 (Jan.-Feb. 81)

**R81L018. Constituents of West
African medicinal plants XXVIII:
additional alkaloids of *Triclisia gilletti*.**

P. D. Owusu, D. J. Slatkin, J. E. Knapp
& P. L. Schiff Jr.*

Dept. of Pharmacy, University of Pitts-
burgh, PA 15261, USA.

J. of Natural Products, **44**, 61 (Jan.-Feb. 81)

R81L019. Flavonoids of *Sullivantia*.

D. E. Soltis, P. Neuman, T. J. Mabry,
K. M. Kerr & G. J. Gastony

Dept. Biology, University of North
Carolina, Greensboro, NC, 27412, USA.

J. of Natural Products, **44**, 50 (Jan.-Feb. 81)

**R81L020. Formation of gossypal
by *Gossypium hirsutum* L cell suspension
cultures.**

P. Heinstein & H. El-Shagi

Dept. of Medicinal Chemistry and Phar-
macognosy, School of Pharmacal Sciences,
Purdue University, West Lafayette,
Indiana 47907, USA.

J. of Natural Products, **44**, 1 (Jan.-Feb. 81)

R81L021. Gas-liquid chromatographic determination of major constituents of *Piper methysticum*.

R. N. Duve

Research Division, Ministry of Agriculture and Fisheries, Koronivia Research Station, P. O. Box 77, Nausori, Fiji.

The Analyst, **106**, 160 (Feb. 81)

R81L022. High-performance liquid chromatographic analysis of gossypal.

S. A. Abou-Donia, J. M. Lasker & M. B. Abou Donia*

Department of Pharmacology, Duke University Medical Center, Durham, NC 27710, USA.

J. of Chromatography, **206**, 606 (27 Feb. 81)

R81L023. High-performance liquid chromatographic assay for the aflavins.

D. A. Wellum & W. Kirby

Group Technical Division, Brooke Bond Leibig Ltd., Trojan Way, Purley Way, Croydon CRO 4XL, Great Britain.

J. of Chromatography, **206**, 400 (20 Feb. 81)

R81L024. High-performance liquid chromatographic method for the determination of diosgenin in plants.

S. B. Mahato, N. P. Sahu & S. K. Roy

Indian Institute of Experimental Medicine
Calcutta-700 032.

J. of Chromatography, **206**, 169 (6 Feb. 81)

R81L025. High-performance liquid chromatography of eburnane alkaloids II separations on silica.

G. Szepesi & M. Gazdag.

Chemical Works of Gedeon Richter Ltd
Budapest, Hungary.

J. of Chromatography, **206**, 57 (23 Jan. 81)

R81L026. High-performance liquid chromatography of podophyllotoxin and related lignans.

D. A. Cairnes, D. G. I. Kingston
M. M. Rao

Dept. of Chemistry, Virginia Polytechnic Institute and State University, Blacksburg, Virginia 24061, USA.

J. of Natural Products, **44**, 34 (Jan.-Feb. 81)

R81L027. High-performance size exclusion chromatography of guar gum.

H. G. Barth & D. A. Smith

Hercules Incorporated Research Center
Wilmington, DE 19899 (USA).

J. of Chromatography, **206**, 410 (20 Feb. 81)

GENERAL

M013. Biodegradation of chemicals of environmental concern.

Alexander

erty Hyde Bailey Professor of Soil Science, Dept. of Agronomy, Cornell University, Ithaca, New York 14853, USA.

Science, **211**, 132 (9 Jan. 81)

M014. Genetech: is its glamor over?—stock analysts predict the future of other biotechnology firms will come.

Sun*

Science, **211**, 262 (16 Jan. 81)

M015. Innovation and evaluation.

Mosteller

pt. Biostatistics, School of Public

Health, Harvard University, Boston, Massachusetts 02115, USA.

Science, **211**, 881 (27 Feb. 81)

R81M016. Instrumentation needs of research universities.

L. Berlowitz, R. A. Zdanis, J. C. Crowley & J. C. Vaughn

Asst Vice President for Academic Affairs, New York University, New York 10012, USA.

Science, **211**, 1031 (6 Mar. 81)

R81M017. Liquefaction of biomass as a source of fuels or chemicals.

I. J. Miller & S. Kevin Fellows

Chemistry Division, Dept. Scientific and Industrial Research, Petone, New Zealand

Nature, **289**, 398 (29 Jan. 81)

NEW TECHNIQUES

N029. A new colorimetric method for the estimation of glycosylated hemoglobin.

S. Nayak & T. N. Pattabiraman

pt. Biochemistry, Kasturba Medical College, Manipal 576 119, Karnataka, India.

Acta Chimica Acta, **109**, 267 (5 Feb. 81)

Address not available.

R81N030. A new way of chemical blood-typing of human single individuals: identification of a blood group Leb-active glycosphingolipid in plasma by mass spectrometry and NMR spectroscopy.

K. E. Falk*, K. A. Karlsson & B. E. Samuelsson

Dept. Biochemistry, University of Goteborg, Goteborg, Sweden.

FEBS Letters, **124**, 173 (23 Feb. 81)

R81N031. Phenytonin-induced teratogenesis: a mouse model.

R. H. Finnell

Division of Medical Genetics, School of Medicine, University of Oregon Health Sciences Centre, Portland 97201, USA.

Science, **211**, 483 (30 Jan. 81)

R81N032. A scanning micropipette molecule microscope.

J. A. Jarrell, J. G. King & J. W. Mills

Research Laboratory of Electronics
Department of Physics, Massachusetts
Institute of Technology, Cambridge,
02139, MA, USA.

Science, **211**, 277 (16 Jan. 81)

R81N033. A three-band hand-held radiometer for field use.G. J. Tucker, W. H. Jones, W. A. Kle
& G. J. Sundstrom

National Aeronautics & Space Adminis-
tration, Goddard Space Flight Centre
Greenbelt, Maryland, 20771, USA.

Science, **211**, 281 (16 Jan. 81)

P NEW REACTIONS**R81P059. The chemistry of ortho-phenylene di-isothiocyanate. 2. reactions with enamines, an ynamine, and some reactive methylene compounds.**

A. W. Faull, D. Griffiths, R. Hull* & T. P. Seden

Imperial Chemical Industries Ltd.,
Pharmaceutics Division, Macclesfield,
Cheshire SK10 4TG, England.

J. of Chemical Society, Perkin Transactions I,
11, 2587 (1980)

P81P060. Convenient and expeditious synthesis of some indoloquinolizine alkaloids.

B. Danieli, G. Lesma & G. Palmisano.

University of Milano, Faculty of Science
Istituto Chim Organ 20133, Milano
Italy.

*J. of Chemical Society, Chemical Communica-
tions*, **18**, 860 (1980)

R81P061. A convenient synthesis of acetylenic ketones from beta diketones using alpha, alphadifluoroalkylamines and freeze-dried potassium fluoride.

T. Kitazume & N. Ishakawa*

Tokyo Institute of Technology, Dept
Chem Technology, Tokyo 152, Japan.

Chemistry Letters, **10**, 1327 (1980)

P062. Direct conversion of amines to the corresponding oxides, biphenyls, and sulfides with *n*-butyl thionitrate.

Dae, K. Shinhama & Y. H. Kim

University of Tsukuba, Dept. Chemistry,
Tsukuba 305, Japan.

of Chemical Society of Japan, **53**, 2023
30)

P063. A facile, rapid preparation of a series of cinnamyl alcohols from allylphenylpropenes using selenium dioxide.

L. Pan, C. A. Cole & T. L. Fletcher*

and Hutchinson Cancer Research Centre,
Mol Biol Cell, Seattle, WA 98104,
A.

thesis, 10, 813 (1980)

P064. Facile synthesis of gamma-, delta-, and epsilon-lactams by cyclodehydration of omega-amino acids on alumina or silica gel.

Bladefont

ds Frumtost, Research Department,
celona 23, Spain.

Carbohydrate Letters, **21**, 2443 (1980)

**IP065. N-methyl-N-anilinomethyl
phenylphosphine oxide: a versatile
reagent for the synthesis of enamines.**

L. J. M. Bröekhof, F. L. Jonkers, & Vandergen.

University of Leiden, Dept. Organic
Chemistry, Gorleus Laboratories 2300
RA Leiden, Netherlands.

Tetrahedron Letters, **21**, 2671 (1980)

R81P066. The neutral deoxygenation (reduction) of aryl carbonyl compounds with raney-nickel, an alternative to the clemmenson, wolf-kishner or Mozingo (thioketal) reductions.

R. H. Mitchell & Y. H. Lai

University of Victoria, Dept. Chemistry,
Victoria, BC V8W 2Y2, Canada.

Tetrahedron Letters, **21**, 2637 (1980)

R81P067. New methods and reagents in organic synthesis. 7. alpha-alkylation of benzylamine under phase-transfer catalyzed conditions.

T. Asai, T. Aoyama, & T. Shioiri*

Nagoya City Univeristy, Faculty of
Pharmaceuatical Science, Nagoya 467,
Japan.

Synthesis, **10**, 811 (1980)

R81P068. 1, 4-Alkyl migrations in Fischer indole cyclizations.

B. Miller & E. R. Matjeka

University of Massachusetts, Dept.
Chemistry, Amherst, MA 01003, USA.

J. of American Chemical Society, **102**, 4772
(1980)

R81P069. One-pot-synthesis of 5, 6,-dihydro-8-h-dibenzo (A. G.) quinoline-8-ones and related isoquinolines, a new synthesis of xylopinine.

M. A. Haimova, V. I. Ognyanov & N. M. Mollov

University of Sofia, Dept. Chemistry, Sofia 1126, Bulgaria.

Synthesis 10, 845 (1980)

R81P070. Oxidation of alcohols by clay-supported iron (III) nitrate, a new efficient oxidizing agent.

A. Cornelis & P. Laszlo*

University of Liege, Institute of Chimie Organic & Biochemistry, 4000 Liege, Belgium.

Synthesis, 10, 849 (1980)

R81P071. Oxidative decarboxylation of arylacetic acids by means of tetrabutylammonium periodate.

E. Santaniello, F. Ponti & A. Manzocchi.

University of Milano, Faculty of Medicine, Istituto Chimie I 20133, Milano, Italy.

Tetrahedron Letters, 21, 2655 (1980)

R APPLIED MICROBIOLOGY

R81R002. Lysine production by yeasts and its mechanism (Japanese).

K. Soda, E. Takenouchi & H. Tanaka.*

Laboratory of Biochemistry, Kyoto College of Pharmacy, Yamashina, Kyoto, Japan.

Hakkokogaku Kaishi, 59, 59 (Jan. 81)

R81R003. Methane production from acetate and associated methane fluxes from anoxic coastal sediments.

F. J. Sansome & C. S. Martens.

Dept. Oceanography, University of Hawali, Honolulu 96822.

Science, 211, 707 (13 Feb 81)

R81R004. "Methanol-shock" on cultivation of methanol-utilizing yeast (Japanese).

T. Urakami,

Niigata Research Laboratory, Mitsubishi Gas Chemical Company Inc., 5 Enoki Cho, Niigata 950, Japan.

Hakkokogaku Kaishi, 59, 1 (Jan. 81)

R81R005. *Solanum jasminoides* Paxt. tiss cultures. 1. production of steroidal sapogenins and glycoalkaloids.

S. C. Jain, P. Khanna & S. Sahoo

Laboratory of Plant Physiology and Biochemistry, Department of Botany, University of Rajasthan, Jaipur 302 00 India.

J. of Natural Product, 44, 125 (Jan-Feb 81)

FORTHCOMING MEETINGS

^{13}C NMR Workshop

Cleveland, 13-15 June 81

Varian Associates,
Box D-070,
611 Hansen Way,
Palo Alto,
California 94303,
USA.

British National Conference on Databases.

Cambridge, 13-14 July 81

Dr. S. M. Dean,
Dept. of Computing Science,
University of Aberdeen,
Aberdeen, U. K.

Liquid Scintillation Counting Workshop

Salford, 14-18 Sept 81

Dr. A. Dyer,
Cockcroft Building,
University of Salford,
Salford, UK.

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ENDOCRINE SYSTEM

R81A044. Paradoxical elevation of growth hormone by intraventricular somatostatin: possible ultrashort-loop feed back.

M. D. Lumpkin, A. Negro-Vilar, & S. M. McCann

Dept. of Physiology, University of Texas Health Science Center at Dallas, Dallas, 75235, USA.

Science, **211**, 1072 (6 Mar. 81)

R81A045. Postnatal gonadal steroid effects on human behavior.

R. T. Rubin, J. M. Reinisch & R. F. Haskett

Dept. of Psychiatry, Harbor, UCLA Medical Center, Torrance, California 90509, USA.

Science, **211**, 1318 (20 Mar. 81)

R81A046. Repair of the ultraviolet-irradiated male genome in fertilized mouse eggs.

B. Brandriff & R. A. Pedersen*

Laboratory of Radiobiology & Department of Anatomy, University of California, San Francisco, USA.

Science, **211**, 1431 (27 Mar. 81)

R81A047. A role for prostacyclin (PGI₂) in excessive menstrual bleeding.

S. K. Smith, M. H. Abel, R. W. Kelly & D. T. Baird*

Dept. of Obstetrics & Gynecology, University of Edinburgh & Medical Research Council Unit of Reproductive Biology, Edinburgh, UK.

Lancet, **I**, 522 (7 Mar. 81)

R81A048. Separation of some estrogens by thin-layer chromatography.

S. M. Petrovic, E. Traljic & J. A. Petrovic

Faculty of Technology, University of Novi Sad, V. Vlahovica 2, 21000 Novi Sad, Yugoslavia.

J. of Chromatography, **205**, 223 (23 Jan. 81)

R81A049. Sexual differentiation of the central nervous system.

N. J. Maclusky & F. Naftolin

Dept. of Obstetrics & Gynecology, Yale University School of Medicine, New Haven, Connecticut 06510, USA.

Science, **211**, 1294 (20 Mar. 81)

R81A050. The structural conformation of the polyphosphate chain of the ATP molecule is critical for its promotion of prostaglandin biosynthesis.

G. M. Brown & G. Burnstock

Department of Anatomy & Embryology, University College London, Gower, Street, London WC1E 6BT, UK.

European J. of Pharmacology, **69**, 81 (5 Jan. 81)

R81A051. Superovulation and embryo transfer in cattle.

G. B. Seidel Jr.

Animal Reproduction Laboratory, Colorado State University, Fort Collins 80523, USA.

Science, **211**, 351 (23 Jan. 81)

R81A052. Synthesis of series 1 prostaglandins through 11-deoxyprostaglandin E₁ (Russian).

V. I. Melnikova, M. A. Lapitskaya, N. I. Bobrova, T. A. Manukina & K. K. Pivnitsky

Institute of Experimental Endocrinology and Hormone Chemistry, Academy of Medical Sciences of the USSR, Moscow, USSR.

Bioorganic Chemistry, **7**, 136 (Jan. 81)

R81A053. Testosterone: a major determinant of extragenital sexual dimorphism.

C. W. Bardin & J. F. Catterall

Center for Biomedical Research, Population Council, 1240 York Avenue, New York 10021, USA.

Science, **211**, 1285 (20 Mar. 81)

R81A054. Thyroid hormones and cathepsin D activity in the rat liver, kidney and brain.

J. G. Satav & S. S. Katyare

Biochemistry Division, Bhabha Atomic Research Centre, Trombay, Bombay 400 085, India.

Experientia, **37**, 100 (Jan. 81)

R81A055. Tris (dichloropropyl) phosphate, a mutagenic flame retardant: frequent occurrence in human seminal plasma.

T. Hudec, J. Thean, D. Kuehl & R. C. Dougherty*

Dept. of Chemistry, Florida State University, Tallahassee 32306, Mexico.

Science, **211**, 951 (27 Feb. 81)

R81A056. Understanding the lease of sex differences.

F. Naftolin

Dept. of Obstetrics & Gynecology, Yale University, School of Medicine, New Haven, Connecticut 06510, USA.

Science, **211**, 1263 (20 Mar. 81)

B NERVOUS SYSTEM

R81B209. Enkephalin-like character and analgesia.

A. Z. Ronai, I. P. Berzetei, J. I. Szekeley, E. Miglecz, J. Kurgyis & S. Bajusz

Institute for Drug Research, P. O. Box 82, Budapest, H-1325 Hungary.

European J. of Pharmacology, **69**, 20 (29 Jan. 81)

R81B210. Enkephalins co-exist with oxytocin and vasopressin in nerve terminals of rat neurohypophysis.

J. Martin & K. H. Voigt

Abteilung Elektroneumikroskopie und Labor für Neuroendokrinologie, Universit t Ulm 7900 ULM, Federal Republic of Germany.

Nature, **289**, 502 (5 Feb. 81)

R81B211. Enkephalinase activity in rat peripheral organs.

C. Llorens and J. C. Schwartz

Unit  109 de Neurobiologie, Centre Paul Broca de l. INSERM 2ter, rue d' Alesia 75014 Paris, France.

European J. of Pharmacology, **69**, 113 (5 Jan. 81)

R81B212. Ethyl β -carboline carboxylate lowers seizure threshold and antagonizes flurazepam-induced sedation in rats.

P. J. Cowen, A. R. Green, D. J. Nutt & I. L. Martin

MRC Clinical Pharmacology Unit, Radcliffe Infirmary, Oxford OX 2 6HE, U. K.

Nature, **290**, 54 (5 Mar. 81)

R81B213. Evidence for the presence of dipeptidyl carboxy-peptidase and its inhibitors in inflammatory synovial fluids.

Y. E. Elisseeva, L. V. Pavlikhina, V. N. Orekhovich, A. Giacomello, C. Salerno & P. Fasella

Institute of Biological and Medical Chemistry, USSR Academy of Medical Sciences, Moscow (USSR).

Biochimica et Biophysica Acta, **658**, 165 (13 Mar. 81)

R81B214. Exercise hyperpnea and locomotion: parallel activation from the hypothalamus.

F. L. Eldridge, D. E. Milhorn & T. G. Waldrop

Depts of Medicine & Physiology, University of North Carolina, Chapel Hill 27514, USA.

Science, **211**, 844 (20 Feb. 81)

R81B215. Functional absence of brain photoreceptors mediating entrainment of circadian rhythms in the adult rat.

G. A. Groos & D. Vander Kooy

Department of Physiology, University of Leiden, Wassenaarseweg 62, 2300 R. C. Leiden, Netherlands.

Experientia, **37**, 71 (Jan. 81)

R81B216. GABA as the pallidothalamic neurotransmitter : implications for basal ganglia function.

J. B. Penney, Jr. & A. R. Young

Department of Neurology, University of Michigan, Ann Arbor, Michigan 48109, USA.

Brain Research, **207**, 195 (23 Feb 81)

R81B217. Giant synaptic potential hypothesis for epileptiform activity.

D. Johnston & T. H. Brown

Program in Neuroscience, Section of Neurophysiology, Department of Neurology, Baylor College of Medicine, Houston, Texas 77030 USA.

Science, **211**, 294 (16 Jan 81)

K81B218. Induction of analgesia by central administration of Org 2766, an analog of ACTH₄₋₉.

J. M. Walker, G. G. Berntson, C. A. Sandman, A. J. Kastin & H. Akil

Mental Health Research Institute, University of Michigan, Ann Arbor, Michigan 48109, USA.

European J. of Pharmacology, **69**, 71 (5 Jan. 81)

R81B219. Induction of glutamine synthetase in embryonic neural retina: its suppression by the gliatoxic agent α -amino adipic acid.

P. J. Linser & A. A. Moscona

Developmental Biology Laboratory, Cummings Life Science Center, University of Chicago, Illinois, USA.

Developmental Brain Research, **1**, 103 (Jan. 81)

R81B220. Is thyrotropin releasing hormone an endogenous ergotropic substance in the brain?

G. Metcalf & P. W. Dettmar

Pharmacology Department, Pharmaceutical Division, Reckitt & Colman, Dansom Lane, Hull HY 8 7 DS.

Lancet, **I**, 586 (14 Mar. 81)

R81B221. Lowering of the convulsion threshold by non-steroidal anti-inflammatory drugs.

H. B. Steinhauer & G. Hertting

Dept. of Internal Medicine IV, University of Freiburg, D7800 Freiburg i. Br., Federal Republic of Germany.

European J. of Pharmacology, **69**, 1 (16 Jan. 81)

R81B222. α -Methylepinephrine, a methyldopa metabolite that binds to α -receptors in rat brain.

M. R. Goldberg, J. F. Gerken, J. Oates & D. Robertson

Division of Clinical Pharmacology, Vanderbilt University School of Medicine, Nashville, Tennessee 37232, U. S. A.

European J. of Pharmacology, **69**, (5 Jan. 81).

R81B223. Metkephamid, a systemically active analog of methionine-enkephalin with potent opioid δ -receptor activity.

R. C. A. Frederickson, E. L. Smithwick, R. Shuman & K. G. Bemis

Lilly Research Laboratories, Eli Lilly Co., Indianapolis, Indiana 46285.

Science, **211**, 603 (6 Feb. 81)

R81B224. Midbrain dopamine neurons: Differential responses to amphetamine isomers.

S. Browder & D. C. German

Department of Psychiatry, University Texas Health Science Centre, Dallas, Texas 75235 (USA)

Brain Research, **207**, 333 (2 Mar. 81)

R81B225. Monoclonal antibodies distinguish identifiable neurones in the leech.

Zipser & R. McKay

Cold Spring Harbor Laboratory, Post Box 100, Cold Spring Harbor, New York 11724, USA.

Nature, **289**, 549 (5 Feb. 81)

R81B226. Neurotensin receptor localization by light microscopic autoradiography in rat brain.

W. S. Young, III & M. J. Kuhar*

Department of Behavioral Sciences, The Johns Hopkins University, School of Medicine, Baltimore, Md 21205, USA.

Brain Research, **206**, 273 (16 Feb. 81)

R81B227. Nucleus raphe dorsalis: a morphometric Golgi study in rat of three groups.

S. Diaz-Cintra and others

Department de Fisiologia, Instituto de Investigaciones Biomedicas, Universidad Nacional Autonoma de Mexico 20, DF, Mexico.

Brain Research, **207**, 1 (23 Feb. 81)

R81B228. On the mechanism of action of anesthetics: direct inhibition of mitochondrial F_1 -ATPase by *n*-butanol and tetracaine.

G. Vanderkooi, J. Shaw, C. Storms, R. Vennerstorm & D. Chignell

Department of Chemistry, Northern Illinois University, DeKalb, IL 60115, USA.

Biochimica et Biophysica Acta, **635**, 200 (12 Mar. 81)

R81B229. Opiate antagonist improves neurologic recovery after spinal injury.

A. I. Faden, T. P. Jacobs & J. W. Holaday

Dept. of Medical Neurosciences, Walter Reed Army Institute of Research, Washington, D. C. 20012, U.S.A.

Science, **211**, 493 (30 Jan. 81)

R81B230. Opiate receptor gradients in monkey cerebral cortex: correspondence with sensory processing hierarchies.

M. E. Lewis, M. Mishkin, E. Bragin, R. M. Brown, C. B. Pert & A. Pert

National Institute of Mental Health, Bethesda, Maryland 20205, U.S.A.

Science, **211**, 1166 (13 Mar. 81)

R81B231. Pentobarbital: dual actions to increase brain benzodiazepine receptor affinity.

P. Skolnick, V. Moncada, J. L. Barker, & S. M. Paul

Laboratory of Bio-organic Chemistry, National Institute of Arthritis, Metabolism & Digestive Diseases, National Institute of Health, Bethesda, Md, 20205, USA.

Science, **211**, 1448 (27 Mar. 81)

R81B232. Peripheral nerve grafts in hereditary leukodystrophic mutant mice (twitcher).

F. Scaravilli & J. M. Jacobs

Department of Neuropathology, Institute of Neurology, The National Hospital, Queen Square, London WC1N 3 BG, UK.

Nature, **290**, 56 (5 Mar. 81)

R81B233. Pharmacological studies on stimulation-produced analgesia in mice.

W. R. Buckett

Research Department, The Boots Company Ltd., Nottingham NG2 3AA, England.

European J. of Pharmacology, **69**, 281 (29 Jan. 81)

R81B234. Postnatal development of presynaptic alpha-adrenoceptors in rat cerebral cortex: studies with brain slices and synaptosomes.

J. Wemer, & A. H. Mulder

Department of Pharmacology, Free University, Medical Faculty, Van der Boechorststraat 7, 1081BT Amsterdam, The Netherlands.

Brain Research, **208**, 299 (16 Mar. 81)

R81B235. d-Propoxyphene acts differently from morphine on opioid receptor-effector mechanisms.

A. Neil & L. Terenius

Department of Pharmacology, University of Uppsala, Box 573, S-75123 Uppsala, Sweden.

European J. of Pharmacology, **69**, 3 (5 Jan. 81)

R81B236. Purification and properties of the membrane-bound acetylcholinesterase from adult rat brain.

Z. Rakonczay, J. Mallot, H. Schenk, C. Vincendon & J. P. Zanetta

Central Research Laboratory, Medical University, 6720 Szeged, Hungary.

Biochimica et Biophysica Acta, **657**, 24 (15 Jan. 81)

R81B237. A quantitative regional analysis of protein synthesis inhibition in the rat brain following localized injection of cycloheximide.

R. P. Kesner, L. M. Partlow, L. G. Burrows & R. F. Berman

Department of Psychology, University of Utah, Salt Lake City, Utah 84112, USA.

Brain Research, **209**, 159 (23 Mar. 81)

R81B238. Rat brain cells in primary culture: characterization of angiotensin II binding sites.

M. K. Raizada & J. W. Young

Department of Physiology and Biophysics, The University of Iowa College of Medicine, Iowa city, Iowa 52242 (USA).

Brain Research, **207**, 343 (2 Mar. 81)

R81B239. Relationships between structure and α -adrenergic receptor affinity of clonidine and some related cyclic amidines.

A. P. Dejong & W. Soudijn

Department of Pharmaceutical Chemistry, University of Amsterdam, Plantage Muidergracht 24, 1018 TV Amsterdam, The Netherlands.

European J. of Pharmacology, **69**, 175 (16 Jan. 81)

R81B240. Reversal of β -noradrenaline denervation-induced increase of β -adrenoreceptor binding in rat neocortex by noradrenaline infusion.

B. Biswas & G. Jonsson*

Department of Histology, Karolinska Institute, S-10401 Stockholm, Sweden.

European J. of Pharmacology, **69**, 341 (29 Jan. 81)

R81B241. Selective effects of LSD and hyperthermia on the synthesis of synaptic proteins and glycoproteins.

M. S. Freedm

Department of Zoology and Biochemistry, Scarborough Cottage, University of Toronto, West Hill, Ontario M1C 1A4 Canada.

Brain Research, **207**, 129 (23 Feb. 81)

R81B242. Selective survival of β_1 -adrenergic receptors in rat cerebellum following neonatal x-irradiation.

K. P. Minneman, R. N. Pittman, N. H. Yeh, D. J. Woodward, B. B. Wolfe & P. B. Molinoff

Department of Pharmacology, Emory University School of Medicine, Atlanta, Ga 30322, USA.

Brain Research, **209**, 25 (23 Mar. 81)

R81B243. Stress-induced release of brain and pituitary β -endorphin: major role of endorphins in generation of hyperthermia, not analgesia.

M. J. Millan, R. Phzewlocki, M. Jerlicz, Ch. Gramsch, V. Holtt & A. Herz

Department of Neuropharmacology, Max-Planck-Institut für Psychiatrie, Kraepelinstrasse 2, D-8000 München 40, GFR.

Brain Research, **208**, 325 (16 Mar. 81)

R81B244. Subpopulations of cultured chick sympathetic neurones differ in their requirements for survival factors.

D. Edgar, Y. A. Barde & H. Thoenen

Abteilung Neurochemie, Max-Planck-Institute for Psychiatrie, D-8033 Martinsried, Federal Republic of Germany.

Nature, **289**, 294 (22 Jan. 81)

R81B245. Suckling infant rats learn a preference for a novel olfactory stimulus paired with milk delivery.

S. C. Brake

Department of Psychiatry, Montefiore Hospital, Bronx, New York 10467, USA.

Science, **211**, 506 (30 Jan. 81)

R81B246. Synaptic effects from chemically activated fine muscle afferents upon α -motoneurons in decerebrate and spinal cats.

K D. Kniffki, E.D. Schomburg & H. Steffens

Physiologisches Institut der Uni, D-3400
Gottingen.

Brain Research, **206**, 361 (16 Feb. 81)

R81B247. The tetracyclic antidepressant mianserin: evaluation of its blockade of presynaptic α -adrenoceptors in a self-stimulation model using clonidine.

G. E. Hunt, D. M. Atrens & G. F. S. Johnson

Department of Psychiatry, University of
Sydney, Sydney, 2006, N. S. W. Australia.

European J. of Pharmacology, **70**, 59
(5 Mar. 81)

R81B248. TRH increases locomotor activity in rats after injection into the hypothalamus.

J. M. Masserano & C. King*

Department of Pharmacology, Louisiana
State University, School of Medicine, 1542
Tulane Ave, New Orleans, Louisiana
70112, USA.

European J. of Pharmacology, **69**, 217
(16 Jan. 81)

R81B249. 2, 4, 5-trichlorophenoxyacetic acid causes behavioral effects in chickens at environmentally relevant doses.

C. A. Sanderson & L. J. Rogers

Pharmacology Department, Monash University,
Clayton, 3168, Victoria
Australia.

Science, **211**, 593 (6 Feb. 81)

R81B250. Two distinct serotonin receptors: regional variations in receptor binding in mammalian brain.

S. J. Peroutka & S. H. Snyder*

Departments of Psychiatry and Behavioral
Sciences, Johns Hopkins University, School
of Medicine, 725 North Wolfe Street
Baltimore, Md. 21205, USA.

Brain Research, **208**, 339 (16 Mar. 81)

R81B2-1. Ultrasensitive stain for proteins in polyacrylamide gels shows regional variation in cerebrospinal fluid proteins.

C. R. Merrill, D. Goldman, S. A. Sedma
& M. H. Ebert

Laboratory of General & Comparative
Biochemistry, National Institute of Mental
Health, Bethesda, Md. 20205, USA.

Science, **211**, 1437 (27 Mar. 81)

R81B252. Vagino-cervical stimulation selectively increases metabolic activity in the rat brain.

T. O. Allen, N. T. Adler, J. H.
Greenberg & M. Reivich

Department of Psychology, University of
Pennsylvania, Philadelphia 19104, USA.

Science, **211**, 1070 (6 Mar. 81)

R81B253. Why do barium ions imitate acetylcholine?

A. Constanti, P. R. Adams* & D. A. Brown

Department of Physiology, University of Texas Medical Branch, Galveston, Texas 77550, USA.

Brain Research, **206**, 244 (9 Feb. 81)

C CARDIOVASCULAR SYSTEM

R81C087. Immunological changes in patients with previous malignant essential hypertension.

T. Gudbrandsson, L. Hansson, H. Herlitz, L. Lindholm & L. A. Nilsson

Dept. of Medicine, Ostra Hospital, 41685 Goteborg, Sweden.

Lancet, **I**, 406 (21 Feb. 81)

R81C088. Isolation and reconstitution of the phosphate transport system from pig heart mitochondria.

H. V. J. Kolbe, J. Bottrich, G. Genchi*, F. Palmieri & B. Kadenbach

Institute of Biochemistry, University of Bari 70126, Bari, Italy.

FEBS Letters, **124**, 265 (23 Feb. 81)

R81C089. Microprocessor-control of drug infusion for automatic blood-pressure control.

L. M. Auer & H. Rodler

Universitätsklinik für Neurochirurgie in Graz Landestrankenhaus A 8036 Graz, West Germany.

Medical & Biological Engineering & Computing, **19**, 171 (Mar. 81)

R81C090. Myosin phosphorylation and the cross-bridge cycle in arterial smooth muscle.

P. F. Dillon, M. O. Aksoy, S. P. Driska & R. A. Murphy

Dept. of Physiology, University of Virginia, School of Medicine, Charlottesville 22903, USA.

Science, **211**, 495 (30 Jan. 81)

R81C091. Peripheral vascular responses during acute anemia.

G. K. Chapler, W. N. Stainsby & M. A. Lillie

Department of Physiology, Queen's University, Kingston, Ontario, Canada K7L 3N6.

Canadian J. of Physiology and Pharmacology, **59**, 102 (Feb. 81)

R81C092. Potassium chloride versus voltage clamp contractures in ventricular muscle.

N. Morad, S. Reeck & M. Rao

Dept. of Physiology, University of Pennsylvania, School of Medicine, Philadelphia 19104, USA.

Science, **211**, 485 (30 Jan. 81)

R81C093. Protein synthesis, amino acid uptake, and pools during isoproterenol-induced hypertrophy of the rat heart and tibialis muscle.

Y. Deshaies, J. Willemot, & J. Leblanc

Department of Physiology & Biochemistry,
School of Medicine, Laval University.
Quebec City, P. Q. Canada.

Canadian J. of Physiology & Pharmacology
59, 113 (Feb. 81)

R81C094. Spontaneous hypertension in cross-suckled rats.

J.P. McMurtry, G.L. Wright & B.C. We

Nonruminant Animal Nutrition Laboratory,
US Dept. of Agriculture, Beltsville
Maryland 20705, USA.

Science, 211, 1173 (13 Mar. 81)

E GASTROINTESTINAL DISORDERS

R81E022. Evidence that the action of cholecystokinin octapeptide on the guinea pig ileum longitudinal muscle is mediated in part by substance P release from the mesenteric plexus.

J. B. Hutchison & G. J. Dockray

Physiological Laboratory, Brownlow Hill,
P. O. Box 147, University of Liverpool,
Liverpool L69 3BX, U. K.

European J. of Pharmacology, 69, 87 (5 Jan. 81).

R81E023. Gastric relaxation and vomiting by apomorphine, morphine and fentanyl in the conscious dog.

R. A. Lefebvre, J. L. Willems & M. C. Bogaert.

Heymans Institute of Pharmacology,
University of Gent Medical School, De
Pintelaan 135, B9000 Gent, Belgium.

European J. of Pharmacology, 69, 139 (16 Jan. 81).

R81E024. Relationship of glicentin to proglucagon and glucagon in the porcine pancreas.

A. J. Moody, J. J. Holst, L. Thim &
S. L. Jensen.

Novo Research Institute, DK 288
Bagsvaerd, Denmark.

Nature, 289, 514 (5 Feb. 81)

R81E025. Substituted benzimidazole inhibit gastric acid secretion by blocking ($H^+ + K^+$) ATPase.

E. Fellenius, T. Berglindh, G. Sachs,
L. Olbe, B. Elander, S. E. Sjostrand & E.
Wallmark

Research Laboratories, AB Hansa
S-43183 Molndal, Sweden.

Nature, 290, 159 (12 Mar. 81).

R81E026. Use of triazine dyes in the affinity chromatographic purification of alkaline phosphatase from calf intestine.

V. Bouriotis & Peter D. G. Dean*

Department of Biochemistry, Liverpool University, P. O. Box 147, Liverpool L69 3BX, Great Britain.

J. of Chromatography, **206**, 521 (27 Feb. 81).

R81E027. Variants of γ -glutamyl transferase in human urine.

K. Rambabu, R. T. Jacob & T. N. Pattabiraman

Department of Biochemistry, Kasturba Medical College, Manipal-576119, Karnataka, India.

Clinica Chimica Acta, **109**, 257 (5 Feb. 81).

R81E028. Vitamin D-dependent phosphorylation of an intestinal protein.

P. W. Wilson & D. E. M. Lawson

Dunn Nutritional Laboratory, University of Cambridge, Cambridge, CB4 1JK, U. K.

Nature, **289**, 600, (12 Feb. 81).

F METABOLIC AND DEGENERATIVE DISORDERS

R81F044. An *in vivo* evaluation in man of the transfer of esterified cholesterol between lipoproteins and into the liver and bile.

C. C. Schwartz, Z. R. Vlahcevic, L. G. Halloran & L. Swell.

Lipid Research Laboratory, Veterans Administration Center, Richmond VA 23249, U.S.A.

Biochimica et Biophysica Acta, **663**, 143 (26 Jan. 81)

R81F045. Lipid and protein membrane components associated with cholesterol uptake by mycoplasmas.

H. Efrati, S. Rottem & S. Razin

Department of Membranes and Ultrastructure, The Hebrew University, Hadassah Medical School, Jerusalem, Israel.

Biochimica et Biophysica Acta, **641**, 386 (6 Mar 81)

R81F046. Lipid-dependent interaction of D- β -hydroxybutyrate dehydrogenase with cellular membranes.

M. Miyahara, Y. Nishihara, Y. Morimizato & K. Utsumi

Department of Medical Biology, Kochi Medical School, Nankoku, Kochi 78151, Japan.

Biochimica et Biophysica Acta, **641**, 232, (20 Feb 81)

R81F047. A metronidazole metabolite in human urine and its risk.

R. L. Koch, B. B. Beaulieu, Jr., E. J. T. Chrystal & P. Goldman

Division of Clinical Pharmacology, Department of Pharmacology, Harvard Medical School, Beth Israel Hospital, Boston, Massachusetts 02215, USA.

Science, 211, 398 (23 Jan 81).

R81F048. Phosphoenolpyruvate synthesis by fetal guineapig liver mitochondria

M. Parameswaran & I. J. Arinze

Department of Biochemistry, School of Medicine, Meharry Medical College, 1005, 18th Avenue, North Nashville, T. N. 37208, U.S.A.

Biochimica et Biophysica Acta, 672, 219, (Jan 81)

R81F049. Phosphorylation of ATP-citrate lyase by a cyclic AMP-independent protein kinase from rat liver.

S. Ramakrishna & W. B. Benjamin

Diabetes Research Laboratory, Department of Physiology, Biophysics, School of Medicine, State University of New York at Stony Brook, Stony Brook, N. Y. 11794, USA.

FEBS Letters, 124, 140 (23 Feb 81)

R81F050. Postnatal development of some membrane bound enzymes of rat liver and kidney.

P. K. Goldsmith

Laboratory of Biochemistry and Metabolism, National Institute of Arthritis, Metabolism, and Digestive Diseases, Bldg 10, RM 9B-02 National Institute of Health, Bethesda, M. D. 20205, U.S.A.

Biochimica et Biophysica Acta, 672, (Jan 81)

R81F051. Purification and properties of γ -glutamyl transferase from normal rat liver.

J. L. Ding, G. D. Smith & T. J. Peters

Division of Clinical Cell Biology, MR Clinical Research Centre, Watford Road, Harrow Middlesex HA1 3UJ, UK.

Biochimica et Biophysica Acta, 657, 33 (13 Feb. 81)

R81F052. Purification and some properties of cytosol 5 nucleotidase from rat liver.

R. Itoh

The National Institute of Nutrition, Yoyama-cho, Shinjuku-ku, Tokyo, Japan

Biochimica et Biophysica Acta, 657, 40 (13 Feb. 81.)

R81F053. A quantitative evaluation of the conversion of 25-hydroxycholesterol to bile acid in man.

L. Swell, C. C. Schwartz, J. Gustafsson, H. Danielsson & Z. R. Vucelja

Division of Gastroenterology, Department of Medicine & Surgery, Veterans Administration Medical Centre, Richmond, VA 23249, USA.

Biochimica et Biophysica Acta, 663, 10 (26 Jan 81)

R81F054. Separation of phospholipids on chromarods.

J. M. Innis & M. T. Clandinin

Department of Nutrition and Food Science, Faculty of Medicine, University of Toronto, 150 College Street, Toronto, Ontario M5S 1A8, Canada.

J. of Chromatography, **205**, 490 (30 Jan. 81)

R81F055. Sequencing of oligosaccharides by mass spectrometry applied on a 12-sugar glycolipid.

M. E. Breimer, G. C. Hansson, K. A. Karlsson, H. Leifler, W. Pimlott & B. E. Samuelsson

Department of Medical Biochemistry, University of Goteborg, Box 33031, 40033 Goteborg, Sweden.

FEBS Letters, **124**, 299 (23 Feb 81)

R81F056. Thin-layer chromatography of phospholipids, separation of major phospholipid classes of milk without previous isolation from total lipid extracts.

P. R. Gentner, M. Bauer & I. Dieterich

Department of Research, Milupa A. G., Bahnstrasse 20-30, D 6382 Friedrichsdorf, Federal German Republic.

J. of Chromatography, **206**, 200 (6 Feb 81)

R81F057. Transport of protons and hydrochloric acid through lipid bilayer membranes.

J. Gutknecht & A. Walter

Department of Physiology, Duke University, Marine Laboratory, Beaufort, NC 28576, USA.

Biochimica et Biophysica Acta, **641**, 183 (Feb 81)

R81F058. Triacylglycerol hydrolysis by cells isolated from lactating rat mammary gland.

R. A. Clegg

Department of Biochemistry, The Hannah Research Institute, Ayr KA65HL, UK.

Biochimica et Biophysica Acta, **663**, 598 (23 Mar 81)

R81F059. Type III hyperlipoproteinemia: defective metabolism of an abnormal apolipoprotein E.

R. E. Gregg, L. A. Zech, E. J. Schaefer & H. B. Brewer, Jr.

Molecular Disease Branch, National Heart, Lung & Blood Institute, National Institute of Health, Bethesda, Maryland 20205, USA.

Science, **211**, 584 (6 Feb 81)

G INFECTIOUS DISEASES**R81G011. Assessment of Dharmendra antigen. (IV) antigenic analysis of lepromines.**

S. Sinha, U. Sengupta, G. Ramu &

K. V. Desikan

Central Jalma Institute for Leprosy, Tajganj, Agra 282 008.

Leprosy in India, **53**, 6 (Jan. 81)

R81G012. Attempt to induce immunotolerance to *M. leprae* in mice.

B. R. Chatterjee

Leprosy Field Research Unit, The Leprosy Mission, P. O. Jalda 723 202.

Leprosy in India, 53, 34 (Jan. 81)

R81G013. Drug interaction—the influence of rifampicin and clofazimine on the urinary excretion of DDS.

S. Balakrishnan & P. S. Seshadri

Dept. of Biochemistry, Central Leprosy Teaching and Research Institute, Chengalpattu 603 001.

Leprosy in India, 53, 17 (Jan. 81)

R81G014. Pathologic changes in striated muscles in leprosy.

S. Kaur

Dept. of Dermatology, Postgraduate Institute of Medical Education and Research, Chandigarh 160 012.

Leprosy in India, 53, 52 (Jan. 81)

R81G015. A relationship between the length of bacilli and the log phase of growth of *Mycobacterium lepraemurium* in cell free liquid medium.

U. Sengupta & M. Nakamura

Immunology Section, Central Jalma Institute for Leprosy, Tajganj, Agra 282 001.

Leprosy in India, 53, 29 (Jan. 81)

R81G016. Synthesis and study of 2,4-diamino 6-substituted arylidene and benzamido quinazolines as possible antituberculosis agents: I.

B. G. Khadse, S. R. Lokhande, M. Patel & V. L. Khairnar

Dept. of Chemotherapy, Haffkine Institute, Parel, Bombay 400 012.

Bulletin of Haffkine Institute, 7, 6 (Dec. 79)

R81G017. Synthesis and study of thiourea, N-(substituted aryl (alkyl)-N'' (6-(2,4-Diamino) quinazolinyl) as possible antituberculosis agents: II.

B. G. Khadse, S. R. Lokhande, M. Patel & V. L. Khairnar

Dept. of Chemotherapy, Haffkine Institute, Parel, Bombay 400 012.

Bulletin of Haffkine Institute, 7, 29 (Dec. 79)

R81G018. Acid hydrolases of merozoites and other erythrocytic stages of *Plasmodium knowlesi*.

H. S. Banyal, V. C. Pandey & G. P. Das

Division of Microbiology, Central Drug Research Institute, Chatter Manik Lal Palace, Lucknow 226 001.

Indian J. of Medical Research, 73, Suppl., (Jan. 81)

R81G019. Anthelmintic properties of essential oil of *Gyathocline hirta* Cass.

Rajendra Srivastava

Dept. of Pharmaceutical Sciences, University of Saugar, Saugar (M. P.).

Science & Culture, 47, 39 (Jan. 81)

R81G020. Antimalarial activity of mefloquine and chloroquine against blood induced *Plasmodium knowlesi* infection in rhesus monkeys.

P. P. Singh & G. P. Dutta*

Division of Microbiology, Central Drug Research Institute, Lucknow 226 001, India.

Indian J. of Medical Research, **73**, Suppl, 23 (Jan. 81)

R81G021. Assay of E and EAC rosette forming peripheral lymphocytes in human bancroftian filariasis.

A. Gajanana, U. S. Bheema Rao, M. Naseema, V. Sambasivam, A. Karunakaran & Z. Basheer Ahmad

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry, 605 011.

Indian J. of Medical Research, **73**, Suppl, 97 (Jan. 81)

R81G022. Biochemical studies of some mosquitoes in relation to development of *Wuchereria bancrofti*.

K. Balaraman, P. K. Das & P. K. Rajagopalan

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry 605 011.

Indian J. of Medical Research, **73**, Suppl, 144 (Jan. 81)

R81G023. Blood schizontocidal activity of antibiotics against *Plasmodium berghei* sensitive as well as resistant to chloroquine, pyrimethamine and primaquine.

S. K. Puri, & G. P. Dutta

Division of Microbiology, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Medical Research, **73**, Suppl, 29 (Jan. 81)

R81G024. Causal prophylactic activity of antibiotics against *Plasmodium gallinaceum* infection.

S. K. Puri, Ram Govind, A. K. Saxena & G. P. Dutta*

Division of Microbiology, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Medical Research, **73**, Suppl, 36 (Jan. 81)

R81G025. Cellular studies in rhesus monkeys during acute, protracted and reinfection stages infected with *Plasmodium knowlesi*.

R. E. Chandanani, N. K. Ganguly, R. N. Prasad, M. S. Ahmad Kabir & R. C. Mahajan*

Dept. of Parasitology, Postgraduate Institute of Medical Education and Research, Chandigarh 160 012.

Indian J. of Medical Research, **73**, Suppl, 45 (Jan. 81)

R81G026. Comparative evaluation of indirect haemagglutination and immunofluorescence tests in serodiagnosis of giardiasis.

N. K. Ganguly, R. C. Mahajan*, V. Vasudev Radha Krishna, B. S. Anand, J. B. Dilawari & R. E. Chandanani

Dept. of Parasitology, Postgraduate Institute of Medical Education & Research, Chandigarh 160 012.

Indian J. of Medical Research, 73, Suppl, 111 (Jan. 81)

R81G027. Comparison of leucocyte migration inhibition and casonis skin tests in human hydatidosis.

P. G. Shivananda, J. Nageshwari, N. R. Sharada & K. N. A. Rao

Dept. of Microbiology, Kasturba Medical College, Manipal 576 119.

Indian J. of Medical Research, 73, Suppl, 107 (Jan. 81)

R81G028. Continuous *in vitro* cultivation of *Plasmodium falciparum*: Replacement of human serum by calf serum and proteose peptone.

W. A. Siddiqui

Dept. of Tropical Medicine & Medical Microbiology, University of Hawaii, School of Medicine, Honolulu, Hawaii 96814, USA.

Indian J. of Medical Research, 73, Suppl, 19 (Jan. 81)

R81G029. Control of *Anopheles stephensi* with larvicide and adulticide in Salem, Tamil Nadu.

C. P. Batra, R. Reuben, R. Kur, S. C. Tewari, K. Veeraraghavan, G. Palani & S. Jesuvan Singh

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Indian J. of Medical Research, 73, Suppl, 114 (Jan. 81)

R81G030. Decline in brugian filariasis in hill tribe settlements of Kerala.

A. Chandrasekharan, K. Balaraman & C. K. Rao*

National Institute of Communicable Diseases, 22, Sham Nath Marg, Delhi 110 054.

Indian J. of Medical Research, 73, Suppl, 82 (Jan. 81)

R81G031. Effects of diethylcarbamazine treatment of *Brugia malayi* microfilaria carriers.

C. K. Rao, A. Chandrasekharan, C. Cherian, Ch. Krishna Rao & S. Russell

National Institute of Communicable Diseases, 22, Sham Nath Marg, Delhi 110 054.

Indian J. of Medical Research, 73, Suppl, 87 (Jan. 81)

R81G032. Evaluation of *Plasmodium knowlesi* antigen for serodiagnosis of human malaria infection.

R. E. Chandanani, R. C. Mahajan*, R. N. Prasad & N. K. Ganguly

Dept. of Parasitology, Postgraduate Institute of Medical Education & Research, Chandigarh 160 012.

Indian J. of Medical Research, 73, Suppl, 41 (Jan. 81)

R81G033. A filariasis survey in Pondicherry villages.

P. K. Rajagopalan, P. S. Shetty & N. Arunachalam

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry 605 001.

Indian J. of Medical Research, **73**, Suppl, 73 (Jan. 81)

R81G034. The genetics of three larval mutants in *Anopheles stephensi*.

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Indian J. of Medical Research, **73**, Suppl, 120 (Jan. 81)

R81G035. Indirect haemagglutinating malaria antibodies in fever cases from a rural community in Alwar Dist., Rajasthan.

K. Ray, A. N. Raichowdhuri, R. S. Sharma, A. Rai, D. S. Choudhury & H. O. Lobel

National Institute of Communicable Diseases, 22, Sham Nath Marg, Delhi 110 054.

Indian J. of Medical Research, **73**, Suppl, 78 (Jan. 81)

R81G036. Inversion (2) R, in *Anopheles stephensi*, its distribution and relation to egg size.

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Indian J. of Medical Research, **73**, Suppl, 124 (Jan. 81)

R81G037. Laboratory studies on the biology of *Armigeres subalbatus* Coquillett, 1898.

M. Geetha Bai, K. N. Panicker, & P. K. Rajagopalan

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry 605 001.

Indian J. of Medical Research, **73**, Suppl, 151 (Jan. 81)

R81G038. Laboratory studies on the biology of *Culex sitiens* Wiedemann, 1828.

K. N. Panicker, M. Geetha Bai, & K. Viswam

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry, 605 001.

Indian J. of Medical Research, **73**, Suppl, 147 (Jan. 81)

R81G039. Larval susceptibility of *Culex pipiens fatigans* and *Anopheles stephensi* to *Metarrhizium anisopliae*.

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Indian J. of Medical Research, **73**, Suppl, 160 (Jan. 81)

R81G040. Larvivorous efficiency of *Gambusia affinis* Baird and Girard.

R. S. Dixit, N. L. Sachdeva & B. D. Varma*

Armed Forces Medical College, Pune
411 001.

Indian J. of Medical Research, **73**, Suppl,
155 (Jan. 81)

R81G041. *Presbytis entellus* as a new host for experimental *Plasmodium knowlesi* infection.

G. P. Dutta, P. P. Singh & P. Saibaba

Division of Microbiology, Central Drug
Research Institute, Lucknow 226 001.

Indian J. of Medical Research, **73**, Suppl,
63 (Jan. 81)

R81G042. Prospects for biological control of mosquitoes.

P. K. Rajagopalan

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Indian J. of Medical Research, **73**, Suppl,
163 (Jan. 81)

R81G043. Protective effect of immunodepression on experimental malaria infection.

V. K. Vinayak, A. Bhatia & A. Aggarwal

Dept. of Experimental Medicine,
Postgraduate Institute of Medical Educa-
tion and Research, Chandigarh 160 012.

Indian J. of Medical Research, **73**, Suppl,
67 (Jan. 81)

R81G044. Red cell and plasma lipids in monkeys infected with *Plasmodium knowlesi*.

Rajvir, S. Majumdar, R. E. Chandnan
N. K. Ganguli, R. N. Chakarvarti
R. C. Mahajan*

Dept. of Parasitology, Postgraduate
Institute of Medical Education
Research, Chandigarh 160 012.

Indian J. of Medical Research, **73**, Suppl,
50 (Jan. 81)

R81G045. Rodent and bovine filarial antigens in detection of antibodies in human bancroftian filariasis by ELISA.

A. Tandon, R. P. Saxena, B. Bhatia,
K. C. Saxena* & V. K. Srivastava

Division of Biochemistry, Central Drug
Research Institute, Lucknow 226 001.

Indian J. of Medical Research, **73**, Suppl,
93 (Jan. 81)

R81G046. Role of simulated migration of mosquitoes in development and reversal of malathion resistance in *Culex pipiens fatigans*.

P. K. Das & P. K. Rajagopalan

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Lenin Street, Kosapalyam, Pondicherry
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Indian J. of Medical Research, **73**, Suppl,
139 (Jan. 81)

R81G047. Seasonal changes in survival rates of immatures of *Culex pipiens fatigans* in different habitats in Pondicherry.

K. B. Menon & P. K. Rajagopalan

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry 605 001.

Indian J. of Medical Research, **73**, Suppl, 36 (Jan. 81)

R81G048. Studies in potential filaricides. Part XI-Synthesis of 2-dialkylaminomethyl-4-substituted amino-phenols as amodiaquine analogs.

V. K. Agrawal, S. Sharma, R. N. Iyer, R. K. Chatterjee & A. B. Sen

Medicinal Chemistry Division, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Chemistry, **19B**, 1084 (Dec. 80)

R81G049. Studies of density and natural survival of immatures of *Anopheles stephensi* Liston in wells of Salem (Tamil Nadu).

R. Kaur & R. Reuben

Vector Control Research Centre, 5/38, Lenin Street, Kosapalayam, Pondicherry 605 001.

Indian J. of Medical Research, **73**, 129, Suppl (Jan. 81)

R81G050. The treatment of kala-azar—new approaches to an old problem.

W. Peters.

Dept. of Medical Protozoology, London School of Hygiene and Tropical Medicine, Keppel Street, London WC1 7HT, England.

Indian J. of Medical Research, **73**, Suppl (Jan. 81)

R81G051. Antigenic relatedness between enterotoxins of *Escherichia coli* associated with adult and infantile diarrhoea.

B. Tabaraie, S. S. Sehgal, A. Singh & D. V. Vadehra

Dept. of Microbiology, Punjab University, Chandigarh 160 014.

Indian J. of Medical Research, **73**, 157 (Feb. 81)

R81G052. Air borne fungi of Lucknow city. A study of two sites.

B. P. Singh, P. Nath & P. K. Mukerji

Dept. of Pathology, Bacteriology and T. B. & Chest Diseases, King George's Medical College, Lucknow 226 003.

Indian J. of Chest Diseases & Allied Sciences, **22**, 199 (Oct.-Dec. 80)

H ANTINEOPLASTIC AGENTS

R81H007. Production of anti-self H-2 antibodies by hybrid mice immune to a viral tumour.

R. Risser & D. J. Grunwald

McArdle Laboratory for Cancer Research,
University of Wisconsin, Madison,
Wisconsin 53706, USA.

Nature, 289, 563 (5 Feb 81)

R81H008. Therapy of mouse lymphoma with monoclonal antibodies to glycolipid: selection of low antigenic variants *in vivo*.

W. W. Young, Jr. & S. Hakomori,

Division of Biochemical Oncology, Fred
Hutchinson Cancer Research Center,
University of Washington, Seattle 98104
USA.

Science, 211, 487 (30 Jan 81)

R81H009. Transforming genes of carcinomas and neuroblastomas introduced into mouse fibroblasts.

C. Shih, L. C. Padhy, M. Murray & R. A.
Weinberg

Dept. Biology & Center for Cancer
Research, Massachusetts Institute of
Technology, Cambridge, Mass 02139, US.

Nature, 290, 261 (19 Mar. 81)

I BIOCHEMICAL PHARMACOLOGY

R81I029. Hydra mesoglea: a model for investigating epithelial cell-basement membrane interactions.

R. M. Day & H. M. Lenhoff

Department of Development Biology,
University of California, Irvine 92717, USA.

Science, 211, 291 (16 Jan 81)

R81I030. Immunotoxins: hybrid molecules of monoclonal antibodies and a toxin subunit specifically kill tumour cells.

H. E. Blythman, P. Casellas, O. Gros,
F.K. Jansen, F. Paolucci, B. Pau & H. Vidal

Centre de Recherches Clin Midy, Rue
du Professeur Joseph Blayac, 34080
Montpellier Cedex, FRANCE.

Nature, 290, 45 (12 Mar 81).

R81I031. New study links chlorination and cancer.

T. H. Maugh II†

Science, 211, 694 (13 Feb 81)

† Address not available.

R81I032. Occluded bound calcium in the phosphorylated sarcoplasmic transport ATPase.

I. Takisawa & M. Makinose

Max-Planck-Institute für medizinische Forschung, Heidelberg, Abteilung Physiologie, 6900 Heidelberg, Jahnstrasse 29, Federal Republic of Germany.

Nature, **290**, 271 (19 Mar 81)

R81I033. Phosphorus distribution in the nucleosome.

D. P. Bazett-Jones & F. P. Ottensmeyer

Department of Medical Biophysics, University of Toronto, Toronto, Canada M4X 1K9.

Science, **211**, 169 (9 Jan 81)

R81I034. Role of guanine nucleotides in the stimulation of thyroid adenylate cyclase by prostaglandin E and cholera toxin.

Y. Friedman, M. Lang, & G. Burke

Division of Endocrinology and Metabolism, Department of Medicine, Cook County Hospital, 1825 W. Harrison Street, Chicago, IL 60612, USA.

Biochimica et Biophysica Acta, **673**, 114 (18 Feb 81)

R81I035. Role of lactone ring of aflatoxin B₁ in toxicity and mutagenicity.

L. S. Lee, J. J. Dunn, A. J. DeLuca & A. Ciegler.

Southern Regional Research Centre, Science & Education Administration, US Department of Agriculture, New Orleans, LA 70179 U.S.A.

Experientia, **37**, 16 (Jan 81)

R81I036. Selective inhibition of T suppressor-cell function by a monosaccharide.

U. H. Koszinowski & M. Kramer

Institute für Immunologie und Gentik DKFZ, 6900 Heidelberg, Federal Republic of Germany.

Nature, **289**, 181 (15 Jan 81)

R81I037. Spectral evidence for distinct mode of interaction of nucleotides with rabbit muscle and rabbit liver aldolase.

M. Kochman & M. T. Mas

Division of Biochemistry, Institute of Organic and Physical Chemistry, Technical University of Wrocław, Wyepianskiego 27, 50-370 Wrocław, Poland.

Biochimica et Biophysica Acta, **667**, 218, (Jan 81)

R81I038. Substrate-adhering lymphoid cells show impaired tumorigenicity and increased immunogenicity.

J. Hochman, A. Katz, E. Levy & S. Eshel

Department of Zoology, The Hebrew University of Jerusalem, Israel.

Nature, **290**, 248 (19 Mar 81)

R811039. Two distinct mechanisms of fibroblast adhesion

P. A. Harper & R. L. Juliano*

Department of Pharmacology, University of Texas Medical School at Houston
P.O. Box 20708, Houston, Texas 77025 USA.

Nature, 290, 136, (12 Mar 81)

J MOLECULAR BIOLOGY

R81J038. Sick cells (II) many agents near trials.

T. H. Maugh II†

Science, 211, 468 (30 Jan 81)

R81J039. Simultaneous analysis of nucleosides and nucleotides by high-performance liquid chromatography.

R. T. Pon & K. K. Ogilvie

Department of Chemistry, McGill University, 801, Sherbrooke Street, West Montreal, Quebec H3A 2K5 Canada.

J. of Chromatography, 205, 202 (23 Jan 81)

R81J040. The structure of eight distinct cloned human leucocyte interferon cDNAs.

D. V. Goeddel, D. W. Leung, T. J. Dull, M. Gross, R. M. Lawn, R. McCandliss*, P. H. Seeburg, A. Ullrich, E. Yelverton & P. W. Gray

Roche Institute of Molecular Biology, Nutley, New Jersey 07110, USA.

Nature, 290, 20 (5 Mar 81)

R81J041. Structure of the neuraminidase gene in human influenza virus A/PR/8/34.

S. Fields, G. Winter, & G. G. Brown

MRC Laboratory of Molecular Biology, Hills Road, Cambridge CB2 2QH, UK

Nature, 290, 213 (19 Mar 81).

R81J042. Three mice "cloned" in Switzerland: reports of the first successful nuclear transplants in mammals revive interest in the cloning of higher animals.

J. L. Marx†

Science, 211, 375 (23 Jan 81).

R81J043. Unfolding of the 'lac' repressor headpiece.

V. Vucelic, D. Vucelic, R. P. Bray & O. Jardetzky

Department of Physical Chemistry, Faculty of Natural Science & Mathematics, Belgrade University, Studentski Trg 16, P. O. Box 550, Belgrade 11000 Yugoslavia.

FEBS Letters, 124, 204 (23 Feb 81).

† Address not available.

PHARMACEUTICS

R81K023. Identification of basic drugs by the thin-layer chromatographic profiles of their ninhydrin complexes.

M. C. Dutt & T. T. Poh

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Outram Road, Singapore 0316
Singapore.

J. of Chromatography, **206**, 267 (20 Feb 81).

R81K024. Induction of drug-metabolizing systems and related enzymes with metabolites and structural analogues of stilbene.

J. Seidegare, J. W. De Pierre, R. Morgenstern, B. Pilotti & L. Ernster

Department of Biochemistry and Organic Chemistry, Arrhenius Laboratory, University of Stockholm, Bergiusvagen 65, Frescati, S-10691, Stockholm, Sweden.

Biochimica et Biophysica Acta, **672**, 65 (7 Jan. 81)

R81K025. Location and effect of procaine on lecithin cholesterol membranes using X-ray diffraction methods.

H. G. L. Coster, V. J. James, C. Berthet & A. Miller

Biophysics Laboratory, School of Physics, University of New South Wales, Kensington, N.S.W. 2033, Australia.

Biochimica et Biophysica Acta, **641**, 281 (20 Feb. 81)

R81K026. The principles of enzyme stabilization IV: catalysis by water-soluble enzymes entrapped into reversed micelles of surfactants in organic solvents.

K. Martinek, A. V. Levashov, N. L. Klyachke, V. I. Pantin & I. V. Berezin

Moscow State University, Chemical Department, Moscow 117234, USSR.

Biochimica et Biophysica Acta, **657**, 277 (15 Jan. 81).

K81K027. A rapid gas-chromatographic method for the quantitative determination of clomethiazole in human serum.

R. Heipertz & Ch. Reimer

Neurologische Universitätsklinik, Martini Strasse 52, 2000 Hamburg 20, Federal Republic of Germany.

Clinica Chimica Acta, **110**, 131 (5 Mar. 81).

R81K028. Real-time color graphics in studies of molecular interactions.

R. Langridge, T. E. Ferrin, I. D. Kuntz & M. L. Connolly

Computer Graphics Laboratory, School of Pharmacy & School of Medicine, University of California, San Francisco 94143, USA.

Science, **211**, 661 (13 Feb. 81).

R81K29 Separation of protein-bound copper and zinc in human plasma by means of gel filtration-ion-exchange chromatography.

J. B. Dawson, M. H. Bahreyni-Toosi, D. J. Ellis & A. Hodgkinson.

Department of Medical Physics, University of Leeds, LS1 3EX, England.

The Analyst, 106, 153 (Feb 81).

R81K030. Simple extraction detector for the liquid chromatographic determination of secoverine in biological samples.

R. J. Reddingius, G. J. De Jong*, U. A. Th. Brinkman & R. W. Frei.

Research Laboratories, Philips-Duphar, P. O. Box 2, 1380 AA Weesp, The Netherlands.

J. of Chromatography, 205, 77 (23 Jan 81).

R81K031. Specific and sensitive radioimmunoassay for 3-methoxy-4-hydroxypheonylethyleneglycol (MOPEG).

T. K. Keeton, H. Krutzsch, & W. Lovenberg

Department of Pharmacology, University of Texas Health Science Center, San Antonio 78284, Texas, USA.

Science, 211, 586 (6 Feb. 81).

R81K032. Spectrophotometric and fluorimetric assays of galactocerebrosidase activity, their use in the diagnosis of Krabbe's disease.

G. T. N. Besley & S. Gatt

Department of Pathology, Royal Hospital for Sick Children and University of Edinburgh EH91LF, U.K.

Clinica Chimica Acta, 110, 19 (19 Feb. 81)

R81K033. studies on the specific interaction of concanavalin A and saccharides by affinity chromatography application of quantitative affinity chromatography to a multivalent system.

Y. Oda, K. Kasai & S. Ishii.

Department of Biochemistry, Faculty Pharmaceutical Sciences, Teikyo University, Sagamiko, Kanagawa-199-0 Japan.

J. of Biochemistry, 89, 285 (Jan 81).

R81K034. Theoretical organometal chemistry.

R. Hoffmann.

Dept. Physical, Science, Cornell University, Ithaca, New York 14853, USA.

Science, 211, 995 (6 Mar. 81).

R81K035. Thin-layer chromatography of aromatic amines on ammonium molybdophosphate and tungstophosphate.

L. Lepri, P. G. Desideri & D. Heimler.

Institut of Analytical Chemistry, University of Florence, Via G. Capponi Florence, Italy.

J. of Chromatography, 207, 29 (6 Mar. 81)

R81K036. Thin-layer chromatography of pyrithiones.

C. D. Seymour & D. L. Bailey

The Procter & Gamble Co, Maimi Valley Laboratories, Box 39175, Cincinnati, OH 45247, USA.

J. of Chromatography, **206**, 301 (20 Feb 81).

R81K037. Trace analysis of free amines by gas-liquid chromatography.

M. Dalene, L. Mathiasson* & J. A. Jonsson.

Department of Analytical Chemistry, University of Lund, P. O. Box 740, S-220 07, Lund, Sweden.

J. of Chromatography, **207**, 37 (6 Mar 81).

NATURAL PRODUCTS

R81L028. Ion-pair adsorption chromatography of pyrrolizidine alkaloids.

H. J. Huizing & T. M. Mailngre

Laboratory for Pharmacognosy and Galenic Pharmacy, Antonius Deusinglaan 2, 9713 AW Groningen, The Netherlands.

J. of Chromatography, **205**, 218 (23 Jan. 81)

R81L029. Isolation and separation of new natural lactum alkaloids of ergot by high-performance liquid chromatography.

M. Flieger, M. Wurst, J. Stuchlik & Z. Rehacek

Institute of Microbiology Czechoslovak Academy of Sciences, 142 20 Prague, Czechoslovakia.

J. of Chromatography, **207**, 139 (6 Mar. 81)

R81L030. *Meconopsis cambrica* alkaloids.

S. R. Hemingway, J. D. Phillipson* & R. Verpoorte

Dept. Pharmacognosy, The School of Pharmacy, University of London, 29-39, Brunswick Square, London, WC1N1AX, UK.

J. of Natural Products, **44**, 67 (Jan.-Feb. 81)

R81L031. Post-column derivatization procedure for the colorimetric analysis of tissue cannabinoids separated by high performance liquid chromatography.

H. K. Borys & R. Karler

Dept. Pharmacology, University of Utah College of Medicine, Salt Lake City, Utah 84132, USA.

J. of Chromatography, **205**, 303 (30 Jan. 81)

R81L032. Potential errors in benzoylecgonine and cocaine analysis.

S. M. Fletcher & V. S. Hancock

Home Office, Central Research Establishment, Aldermaston, Reading, Berks RG7 4PN, Great Britain.

J. of Chromatography, **206**, 193 (6 Feb. 81)

R81L033. The primary structure of aspergillopepsin A—a carboxylic proteinase from *Aspergillus aculeatus* II. Amino acid sequences of chymotryptic peptides. (Russian)

E. K. Kotlova, V. I. Ostoslavskaya, L. P. Revina, G. G. Kovaleva, I. A. Surova, E. D. Levin, E. A. Timokhina & V. M. Stepanov

Institute for Genetics and Selection of Industrial Microorganisms, Moscow.

Bioorganic Chemistry, 7, 58 (Jan. 81)

R81L034. Protoberberine alkaloids: chiroptical properties and absolute configuration.

B. Ringdahl, R. P. K. Chan, J. C. Craig & Late R. H. F. Manske

Dept. of Pharmaceutical Chemistry
School of Pharmacy, University
California, San Francisco, CA 941
USA.

J. of Natural Products, 44, 75 (Jan. 81)

R81L035. Separation of lanthanides by capillary tube isotachophoresis using complex-forming equilibria.

I. Nukatsuka, M. Taga & H. Yoshida

Dept. of Chemistry, Faculty of Science
Hokkaido University, Sapporo 060, Japan

J. of Chromatography, 205, 95 (Jan. 81)

M GENERAL

R81M018. Living tissue formed in vitro & accepted as skin-equivalent tissue of full thickness.

E. Bell, H. P. Ehrlich, D. J. Buttle & T. Nakatsuji.

Dept. Biology, Massachusetts Institute of Technology, Cambridge 02139, MA, USA.

Science, 211, 1052 (6 Mar. 81)

R81M019. New niche for science on reference shelf: dictionary of scientific biography is complete, gives historians of science a kind of magnum opus.

J. Walsh†

Science, 211, 263 (16 Jan. 81)

R81M021. Prudent practices handling hazardous chemicals laboratories.

B. C. McKusick

Haskell Laboratory for Toxicology
Industrial Medicine, E. I. du Pont
Nemours & Co., Wilmington, Delaware
19898, USA.

Science, 211, 777 (20 Feb. 81)

R81M021. The origin of man.

C. O. Lovejoy

Dept. Sociology & Anthropology, Kent
State University, Kent, Ohio 442
USA.

Science, 211, 341 (23 Jan. 81)

†Address not available.

R81M022. Science and technology in the White House 1977 to 1980. Part 1
I.

Press

Advisor to President Carter & Director of the Office of Science & Technology Policy, Executive Office of the President, Washington, D. C. 20500, USA.

Science, **211**, 139 (9 Jan. 81)

Science, **211**, 24 (Jan. 81)

R81M023. Who will build the next supercomputer? NASA wants the United States to fund development of a new supercomputer before Japan can dominate the field.

G. B. Kolata†

Science, **211**, 68 (16 Jan. 81)

NEW REACTIONS

R81P072. Preparation and stereochemistry of 4-aryl-3-butenylamines, a novel synthesis of an oxazolo [2, 3,-A] isoindole.

D. K. Olsen, B. E. Torian, C. D. Morgan & L. L. Brawn*

Idaho State University, Dept. Chemistry, Pocatello, ID 83209, USA.

J. of Organic Chemistry, **45**, 4049 (1980)

R81P073. Reaction of spiro (piperidine-4,2'-(1'2',3',4'-tetrahydroquinazolin)-4'-ones with acid anhydrides.

M. Yamato, J. Horiuchi & Y. Takeuchi.

Okayama University, Faculty Pharmaceutical Science, Okayama 700, Japan.

Chemical & Pharmaceutical Bulletin, **28**, 2623 (1980)

R81P074. Reactions of ethyl 3-ethoxymethylene-2,4-dioxovalerate and ethyl ethoxymethyleneoxaloacetate with indole analogs

T. Kurihara, T. Tani, H. Imai & K. Nasu.

Osaka College of Pharmacy, Matsubara, Osaka 500, Japan.

Chemical & Pharmaceutical Bulletin, **28**, 2972 (1980)

R81P075. Reductive deamination of primary amines.

A. R. Katritzky, K. Horvath & B. Plau.

University of East Anglia, School of Chemical Science, Norwich 7TJ, England.

J. of Chemical Society, Perkin Trans I, **11**, 2554 (1980)

R81P076. Selective reduction of heterocyclic azides and hydrazino compounds to amines by molybdenum (III) species.

S. Polanc, T. Stanovnik* & M. Tisler.

University Ljubljana, Dept. Chemistry, Yu-61000, Ljubljana, Yugoslavia.

Synthesis (10), 830 (1980)

†Address not available.

R81P077. A simple preparation of aromatic or hetero-aromatic sulphides.

C. S. Giam & K. Kikukawa

Texas A & M University, Dept. Chemistry, College Station, TX 77853., USA.

J. of Chemical Society, Chemical Communications **16**, 756 (1980)

R81P078. A simple stereospecific synthesis of (\pm)-muscarine.

A. M. Mubarak & D. M. Brown*

University of Cambridge, Chemical Laboratory, Cambridge CB2 EW, England.

Tetrahedron Letters, **21**, 2453 (1980)

R81P79. A simple synthesis of 8-aza-D-homo-estrane analogs.

A. M. Moiseenkov, E. N. Rozhkov & A. Y. Strakov

Polytechnology Institute, Faculty of Chemistry, Riga, USSR.

J. fur Praktische Chemie, **322**, 554 (1980)

R81P080. A simplified procedure for the preparation of 2-alkoxycarbonyl-5-aryl-4-cyano-3-hydroxy-3-phenyltetrahydrothiophenes.

S. Kambe, K. Saito, A. Sakurai & H. Mioorikawa

Toyama Technical College, Tochigi 323, Japan.

Synthesis, **10**, 839 (1980)

R81P081. Steric selectivity in oxidations of diols.

M. P. Doyle, R. L. Dow, V. Bagheri W. J. Patrie

Hope College, Dept. Chemistry, Holland MI, 49423.

Tetrahedron Letters, **21**, 2795 (1980)

R81P082. Studies on tertiary amine oxides. 69. reactions of 2-chloromethylquinoline derivative with 2-nitropropane.

M. Nishikawa, S. Saeki, M. Hamana H. Noda

Kyushu University, Faculty of Pharmaceutical Science, Fukuoka 812, Japan.

Chemical & Pharmaceutical Bulletin, **28**, 2436 (1980)

R81P083. Asymmetric reduction of simple achiral ketones with lithium aluminum hydride partially decomposed by (-)-N-methylephedrine and N-ethylaniline.

S. Terashima*, N. Tanno & K. Koga

University of Tokyo, Faculty of Pharmaceutical Science, Tokyo 1138, Japan.

Chemistry Letters, **8**, 981 (1980)

R81P084. Synthesis of some phenylhexahydroazepino (4,5-B) indoles as potential neuroleptic agents.

A. J. Elliott, E. H. Gold & H. Guzik

Schering-Plough Pharmaceutical Research Division, Chemical Research Department, Bloomfield, NJ 07003, USA.

J. of Medicinal Chemistry, **23**, 1268 (1980)

R81P085. "Synthetic enzymes". Highly stereoselective epoxidation of **α-terpineol** in the tri-phasic toluene-water-poly [(S)] alanine system.

Julia, J. Masana & J. C. Vega

Institut of Quimica Sarria, Dept. of Organic Quimica, Barcelona 17, Spain.

Angewandte Chemie, **19**, 929 (1980)

R81P086. The total syntheses of (±)-**α- and β-dihydrocleavamines**, (±)-**16-methoxycarbonyl-dihydrocleavamine**, (±)-**coronaridine**, (±)-**5-dihydrocatharanthine**, (±) **ibogamine** and (±)-**catharanthine**.

Attaurrahman, J. A. Beisler & J. Harbymason

Institute of Chemistry, Karachi-32, Pakistan.

Tetrahedron, **36**, 1063 (1980)

R81P087. The enzymatic digestion of **elastin** at acidic pH.

J. F. Collins & R. Fine

Audie L. Murphy Memorial Veterans Hospital, University of Texas Health Science Centre at Antonio, San Antonio, TX, 78284, USA.

Biochimica et Biophysica Acta, **657**, 295 (Jan. 81)

R81P088. A genetic approach to the biosynthesis of the rifamycin-chromophore in *Nocardia mediterranei*: III. isolation and identification of an early aromatic ansomycinprecursor containing the seven carbon amino starter-unit and three initial acetatpropionate-units of the ansa chain.

O. Ghisalba, H. Fuhrer, W. J. Richter & S. Moss

Pharmaceuticals Division and Central Function Research of Ciba-Geigy Ltd., Basel, Switzerland.

J. of Antibiotics, **34**, 58 (Jan. 81)

R81P089. A genetic approach to the biosynthesis of the rifamycin-chromophore in *Nocardia mediterranei*: IV. identification of 3-amino-5-hydroxybenzoic acid as a direct precursor of the seven-carbon amino starter unit.

O. Ghisalba & J. Nuesch

Pharmaceutical Division and Central Function Research of Ciba-Geigy Ltd., Basel, Switzerland.

J. of Antibiotics, **34**, 64 (Jan. 81)

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ENDOCRINE SYSTEM

R81A057. Characterization of neuropeptides by reversed-phase, ionpair liquid chromatography with fast column detection by radioimmunoassay. Application to thyrotropin releasing hormone.

Spindel, D. Pettibone, L. Fisher, J. Ernstrom & R. Wurtman

Laboratory of Neuroendocrine Regulation and Laboratory of Brain and Metabolism, Dept. of Nutrition and Food Science, Massachusetts Institute of Technology, Cambridge, MA 02139, U.S.A.

J. of Chromatography, **222**, 381 (Mar. 81)

R81A058. Deoxyribonucleic acid (DNA) content of morphologically different sperm types from normal and subfertile human males.

A. Schmassmann, G. Mikuz, G. Bartsch, C. Gysin & H.P. Rohr

Dept. of Pathology, Schonbeinstr. 40, 4003 Basle, Switzerland.

Andrologia, **13**, 33 (Jan -Feb. 81)

R81A059 The differential development of mitochondrial cytochrome P-450 and the respiratory cytochromes in rat ovary.

P.A. Naumoff & P.M. Stevenson

Dept. of Biochemistry, University of Western Australia, Nedlands, Western Australia 6009, Australia.

Biochemica et Biophysica Acta, **673**, 359 (3 Apr. 81)

R81A060. Distribution volume, metabolic clearance and plasma half disappearance time of exogenous luteinizing hormone releasing hormone in normal women and women with obesity and anorexia nervosa.

K. Chibamori, F. Suehiro, T. Ogawa, K. Sato, H. Mori, I. Oshima & S. Saito

Dept. of Internal Medicine, Takushima University School of Medicine, Tokushima, Japan.

Acta Endocrinologica, **96**, 1 (Jan. 81)

R81A061. DNA synthesis and secretory activity in parathyroid adenomas.

H.M. Lloyd, J.M. Jacobe, D. Willgoss, J. Kearney & P. Ward

Dept. of Medicine, University of Queensland, Clinical Science Building, Royal Brisbane Hospital, Brisbane 4029, Australia.

Acta Endocrinologica, **96**, 70 (Jan. 81)

R81A062. Effect of cyproterone acetate on pituitary adrenocortical function in man.

R.G.A. Vanwayjen & A. Vanden Ende

Metabolic Department of the Hospital Vereeniging voor Zickenverpleging, Prinsengracht 769, 1017 jz Amsterdam, The Netherlands.

Acta Endocrinologica, **96**, 112 (Jan. 81)

R81A063. The effect of exogenous steroids and/or a dopaminergic receptor agonist on plasma luteinizing hormone concentration in ovariectomized rats.

M.F. Smith, R.E. Owens, T.A. Fitz, J.L. Fleeger & P.G. Harms

Physiology of Reproduction Laboratory, Animal Science Department, Texas A&M University, College Station, Texas 77843, USA.

IRCS Medical Science, **9**, 65 (Jan. 81)

R81A064. Effect of 5-methoxytryptophol on the action of luteinizing hormone releasing hormone in the release of luteinizing hormone and its competition with melatonin.

M. Mieno, Er. Ogawa, R. Tanaka*, M. Iimori & K. Yamashita

Dept. of Pathophysiology, Atomic Disease Institute, Nagasaki University, School of Medicine, Nagasaki, 852 Japan.

IRCS Medical Science, **9**, 87 (Feb. 81)

R81A065. Effect of prostaglandins A-1, E-2 and F-2a on blood plasma levels of testosterone, LH and FSH in male rats.

A.K. Didolkar, A. Gurjar, U.M. Joshi, A.R. Sheth & D. Roychowdhury*

Dept. of Biochemistry, Nagpur University, Mahatma Gandhi Road, Nagpur 440 010, India.

Andrologia, **13**, 50 (Jan.-Feb. 81)

R81A066. Effect of serotonin and precursor on the testicular function in male rats.

G. F. Gonzales, J. Coyotupa & R. Garcia

Laboratorio de Endocrinologia, Instituto de Investigaciones de la Altura, Universidad Peruana Cayetano Heredia, Apdo 6083, Lima, Peru.

IRCS Medical Science, **9**, 61 (Jan. 81)

R81A067. Effect of urea on estrogen binding by rat uterine eosinophils *in vitro*.

M. A. Mena, C. Unda, A. Rodriguez & A. N. Tchernitchin

Laboratory of Experimental Endocrinology, Dept. of Experimental Morphology, University of Chile Medical School, Santiago-Norte, P. O. Box 21104, Correo 21, Santiago, Chile.

IRCS Medical Science, **9**, 73 (Feb. 81)

R81A068. Factors influencing plasma levels of 6-keto prostaglandin F_{1α}.

M. D. Mitchell, S. N. Sellers & A. Turnbull

Nuffield Department of Obstetrics Gynaecology, University of Oxford, John Radcliffe Hospital, Headington, Oxford OX3 9DU, England.

IRCS Medical Science, **9**, 120 (Feb. 81)

R81A069. Follicular development in the neonatal mouse ovary: effect of dermal growth factor.

Lintern-Moore, G. P. M. Moore, B. A. Manaretto & D. Robertson

School of Biological Sciences, Macquarie University, North Ryde, N. S. W. 2113, Australia.

Acta Endocrinologica, **96**, 123 (Jan. 81)

R81A070. Gold in human semen.

K. P. Skandhan

Dept. of Physiology, BJ Medical College, Ahmedabad 380 016, India.

Andrologia, **13**, 78 (Jan.-Feb. 81)

R81A071. Growth hormone stimulates adrenal steroidogenesis in the fetus.

U. P. Devaskar, S. U. Devaskar, S. Voina, N. Velayo & M. A. Sperling

Department of Pediatrics, Division of Neonatology, Children's Hospital Research Foundation, University of Cincinnati Medical Centre, Cincinnati, Ohio 45267, USA.

Nature, **290**, 404 (2 Apr. 81)

R81A072. The growth of different organs of normal and dwarfed Snell mice, before and during growth hormone therapy.

S. Van Buul-Offers & J. L. Van den Brande

Wilhelmina Children's Hospital, Nieuwe Gracht 137, 3512 LK Utrecht, The Netherlands.

Acta Endocrinologica, **96**, 46 (Jan. 81)

R81A073. Histological changes in the endometrium after the use of IUCD and oral contraceptives.

V. K. Singh, P. Rohatgi & M. Mukerjee
G. S. V. M. Medical College, Kanpur.

J. of Obstetrics and Gynaecology of India, **30**, 890 (Dec. 1980)

R81A074. Influence of thyroxine on the effects of field stimulation of the guineapig vas deferens.

V. A. Vuckovic

Institute of Physiology, Faculty of Medicine, University of Belgrade, Yugoslavia.

IRCS Medical Science, **9**, 85 (Feb. 81)

R81A075. Inhibition of stress hyperglucagonemia by alpha-adrenergic blockade: lack of effect of bilateral adrenal thyroidectomy, or prolonged medullectomy treatment by thyroxine

I. Klimes, M. Vigas, D. Jezova, S. Nemeth & J. Jurcovicova

Institute of Experimental Endocrinology, Center of Physiological Sciences, Slovak Academy of Sciences, Vlarska 3, 809 36 Bratislava, Czechoslovakia.

IRCS Medical Science, **9**, 86 (Feb. 81)

R81A076. Inherited primary hypothyroidism in mice.

W. G. Beamer, E. M. Eicher, L. J. Maltais & J. L. Southard

Jackson Laboratory, Bar Harbor, Maine 04609, USA.

Science, **212**, 61 (3 Apr. 81)

R81A077. *In vitro* decondensation of human sperm chromatin.

A. Incharoensakdi & S. Panyim*

Dept. of Biochemistry, Faculty of Science, Mahidol University, Rama 6 Road, Bangkok, Thailand.

Andrologia, **13**, 64 (Jan.-Feb. 81)

R81A078. Male "pill" blocks sperm enzyme.

T. H. Maugh II†

Science, **212**, 324 (17 Apr. 81)

R81A079. The loosely bound non-histone chromosomal proteins of rat prostate in androgen action.

S. T. Hiremath, R. A. Maciewicz & T. Y. Wang

Division of Cell and Molecular Biology, State University of New York at Buffalo, Buffalo NY 14270, USA.

Biochimica et Biophysica Acta, **653**, 130 (26 Mar. 81)

R81A080. Negative inotropic effect of thyrotropin releasing hormone (TRH) on rat isolated atria.

S. Mora & G. Diaz-Veliz

Departamento de Medicina Experimental, Facultad de Medicina Oriente, Universidad de Chile, P. O. Box 16038, Santiago 9, Chile.

IRCS Medical Science, **9**, 21 (Jan. 81)

R81A081. Neurotransmitter control of hypothalamic-pituitary-thyroid function in rats.

J. E. Morley, G. L. Brommer*, B. Sharpe, T. Yamada, A. Yuwiler & J. M. Hershman

Neuro-biochemistry Research Laboratory, T-85 VA Brentwood Medical Center, 11301 Wilshire Blvd, Los Angeles California 90073, USA.

European J. Pharmacology, **70**, 263 (26 Mar. 81)

R81A082. A new synthesis of prostaglandin E1 starting from 11-deoxyprostaglandin E1. (In Russian)

V. I. Melnikova, K. K. Piunitsk

Institute of Experimental Endocrinology and Hormone Chemistry, Academy of Medical Science, Moscow, USSR.

Bio-organic Chemistry, **7**, 280 (Feb. 81)

†Address not available

R81A083. Oestrogen metabolism in adult rats brain.

V. R. Reddy, R. Rajan & M. J. Daly

Dept. of Obstetrics & Gynaecology,
Temple University Medical School, 3401
N. Broad Street, Philadelphia, Pennsyl-
ania 19140, USA.

Acta Endocrinologica, **96**, 7 (Jan. 81)

R81A084. Pituitary-thyroidal function in children with β -thalassaemia major.

L. Cavallo, A. Mautone, M. Altomare,
M. Licciulli, A. Pascazio and F. Schettini

Istituto di puericultura, University of
Bari, School of Medicine, Bari, Italy.

Acta Endocrinologica, **96**, 59 (Jan. 81)

R81A085. Plasma pattern of immunoreactive ACTH in normal man and in patients with Nelson's syndrome.

M. Thoren, M. Ajne & K. Hall

The Department of Endocrinology,
Karoliska Hospital, S-10401 Stockholm,
England.

Acta Endocrinologica, **96**, 15 (Jan. 81)

R81A086. Preliminary studies on antifertility activity of *Lygodium flexosum* (Linn) in albino rats-1.

R. T. Mahajan, B. B. Gaitonde, V. B.
Babne & I. V. Bade

Director's Research Cell, Haffkine Insti-
tute, Parel, Bombay 400 012, India.

Bulletin Haffkine Institute, **7**, 12 (Dec. 79)

R81A087. Semen analysis in males exposed *in vitro* to diethylstilbestrol (DES) or placebo.

G. E. B. Schumacher, W. B. Gill, M. M.
Hubby & R. R. Blough

Dept. of Obstetrics & Gynecology,
University of Chicago, Illinois, USA.

IRCS Medical Science, **9**, 100 (Feb. 81)

R81A088. Studies in antifertility agents: Pt. XXVIII-1, 2-trans- 1-(P-(β -Pyrrolidinoethoxy) phenyl)-2-substituted benzyl-6-methoxy-1, 2, 3, 4-tetrahydronaphthalenes.

S. C. Tewari & S. N. Rastogi

Medicinal Chemistry Division, Central Drug
Research Institute, Lucknow 226 001, India.

Indian J. of Chemistry, **19B**, 1060 (Feb. 80)

R81A089. Studies on morphological characteristics of buffalo spermatozoa.

V. B. Saxena & S. S. Trepathi

College of Veterinary Science, G. B. Pant
University of Agriculture & Technology,
Pantnagar 263 145, India.

Indian J. of Animal Health, **19B**, 89 (Dec. 80)

R81A090. Studies on serum apolipoproteins and lipids in aminotic fluid and neonatal urine.

W. J. McConathy, P. R. Blackett &
O. R. Kling

Laboratory of Lipid & Lipoprotein
Studies, Oklahoma Medical Research
Foundation, 825 NE 13th Oklahoma City,
OK, 73104, USA.

Clinica Chimica Acta, **111**, 153 (9 Apr. 81)

R81A091. Testosterone, dihydrotestosterone and androstane diols in plasma, testes and prostates of rats during development.

C. Corpechat, E. E. Baulieu & P. Robel

ER 125 Cnrs and Unite de Recherches Sur le Metabolisme Moleculaire et la Physio-Pathologie des Steroides (433), de l'Institute National de la Sante et de la Recherche medicale, 75, rue du General Leclerc, 94270, Bicetre, France.

Acta Endocrinologica, **96**, 127 (Jan. 81)

R81A092. Thyroid hormone regulation of the catecholamine effects in human adipose tissue.

P. Arner, A. Wennlund & J. Ostman

Dept of Medicine & Research Centre Karolinska Institute, Huddinge Hospital S-14186 Huddinge, Sweden.

Acta Endocrinologica, **96**, 65 (Jan. 81)

R81A093. Ultrastructure of human spermatozoa in the presence of the spermicide nonoxinol-9 and a vaginal contraceptive containing nonoxinol-9.

W. B. Schill & H. H. Wolff

Dermatologische Klinik und Poliklinik der Ludwig-Maximilians-Universitat Munchen, Frauenlobstr 9/11, D-80 Munchen 2, Germany.

Andrologia, **13**, 42 (Jan.-Feb. 81)

B NERVOUS SYSTEM

R81B254. α_2 -Adrenoreceptors in rat brain are decreased after long-term tricyclic antidepressant drug treatment.

C. B. Smith, J. A. Garcia-Sevilla & P. J. Hollingsworth

Dept. of Pharmacology, University of Michigan Medical School, Ann Arbor, Mich 48109, USA.

Brain Research, **210**, 413 (6 Apr. 81).

R81B255. Agents acting on CNS: Part XXXI-synthesis of 2-substituted 1, 2, 3, 5, 11, 11a-Hexahydro-6H-imidazo-(5, '1': 6, 1) pyrido (3, 4-b) indoles.

N. Kumar, M. K. Dhaon, S. K. Agrawal, A. K. Saxena, (Late) P. C. Jain & Nitya Nand

Medicinal Chemistry Division, Central Drug Research Institute, Lucknow 226 India.

Indian J. Chemistry, **19B**, 1087 (Dec. 80)

R81B256. An analysis of the mechanism of 5-hydroxytryptamine induced vasopressor response in ganglion-blocked anaesthetized dogs.

W. Feniuk, J. Hare & P. P. Humphrey*

Dept. of Pharmacology & Dept. Biochemistry, Glaxo Group Research Limited, Ware, Hertfordshire, SG12 0UK.

J. Pharmacy & Pharmacology, **33**, (Mar. 81)

R81B257. Antagonism by chlornalrexamine of some effects of Δ^9 -tetrahydrocannabinol in rats.

F. C. Tulunay, I. H. Ayhan, P. S. Portoghese & A. E. Takemori*

Dept. of Pharmacology, University of Minnesota, 3-260 Millard Hall, 435 Delawar Street S. E., Minneapolis, Minnesota 55455, USA.

European J. of Pharmacology, **70**, 219 (12 Mar. 81)

R81B258. Apparent serotonergic modulation of the dose-dependent biphasic response of neostriatal neurons produced by D-Amphetamine.

G. V. Rebec, K. D. Alloway & S. D. Curtis

Dept. of Psychology, Indiana University, Bloomington Ind. 47405, USA.

Brain Research, **210**, 277 (6 Apr. 81)

R81B259. Behavioral evidence that substance P may be a spinal cord sensory neurotransmitter.

M. F. Piercey, P. J. K. Dobry, L. A. Schroeder & F. J. Einspahr

The Upjohn Company, Kalamazoo, Mich 49001, USA.

Brain Research, **210**, 407 (6 Apr. 81)

R81B260. Benzodiazepine antagonism by hormone and other carbolines in vitro and in vivo.

H. Rommelspacher, C. Nanz, H. O. Borbe, K. J. Fehske, W. E. Muller* & U. Wollert

Pharmakologisches Institut der Universität Mainz, D-6500 Mainz.

European J. of Pharmacology, **70**, 409 (26 Mar. 81)

R81B261. Cardiolipins are 'in vitro' inhibitors of rat brain ($\text{Na}^+ + \text{K}^+$)-dependent ATPases.

A probable mechanism of action.
E. Torogoyco, M. B. Rodriguez, A. M. Preston & A. F. Rorethal

University of Puerto Rico, School of Medicine, San Juan, Puerto Rico 00936.

Biochimica et Biophysica Acta, **642**, 96 (20 Mar. 81)

R81B262. Caffeine blocks the delayed K^+ outward current of molluscan neurons.

A. Hermann

University of Konstanz, Fakultät für Biologie, D-7750 Konstanz, Federal Republic of Germany.

Brain Research, **211**, 480 (4 May 81)

R81B263. Central dopaminergic neurons during development of genetic and Doca-salt hypertension in the rat.

G. Le Fur, F. Guilloux, M. Kabouche, N. Mitrani, O. Ferris & A. Uzan

Pharmendustrie, Groupe PHARMUKA, 35, quai du Moulin de Cage, F-92231 Gennevilliers, France.

Developmental Brain Research, **1**, 153 (Apr. 81)

R81B264. Characterization and partial purification of a neuronal factor which increases acetylcholine receptor aggregation on cultured muscle cells.

H. C. Bauer, M. P. Daniels, P. A. Pudemat, L. Jacques, H. Sugiyama & C. N. Christian

Laboratory of Developmental Neurobiology, National Institute of Child Health and Human Development, National Institute of Health, Bethesda, MD 20205, USA.

Brain Research, **209**, 395 (30 Mar. 81)

R81B265. Choline reverses naloxone-induced decreases in hippocampal acetylcholine content and suppresses escape behavior in opiate-dependent rat.

L. J. Botticell & R. J. Wurtman*

Laboratory of Neuroendocrine Regulation, Dept. of Nutrition and Food Sciences, Massachusetts Institute of Technology, Cambridge, Mass 02139, USA.

Brain Research, **210**, 479 (6 Apr. 81)

R81B266. Development of the brain stem reticular core: An assessment of dendritic state and configuration in the perinatal rat.

R. P. Hammer Jr., R. D. Lindsay & A. B. Scheibel

Laboratory of Neurophysiology, Building 36, Room 2-D-10, National Institute of Mental Health, Bethesda MD 20205, USA.

Developmental Brain Research, **1**, 179 (Apr. 81)

R81B267. Diamide, temperature and spontaneous transmitter release at the neuromuscular junction: Stimulation of exocytosis by a direct effect on membrane fusion.

S. J. Publicover & C. J. Duncan*

Dept. of Zoology, University of Liverpool, P. O. Box 147, Liverpool L69 3BX, UK.

European J. of Pharmacology, **70**, 203 (1 Mar. 81)

R81B268. Effects of antidepressant drugs on different receptors in the brain.

H. Hall & S. D. Ogren

Dept. of Pharmacology, Research and Development Laboratories, Astra, Lakemedel ABS-15185 Sodertalje, Sweden

European J. of Pharmacology, **70**, 393 (2 Mar. 81)

R81B269. Effects of halopemide on GABA receptor binding, uptake and release.

A. J. M. Loonen, C. J. Soe-Agnie and W. Soudijn

Psychiatric Hospital 'Voorburg' P. O. Box 10150, 5260 GB Vught, The Netherlands.

Brain Research, **210**, 485 (6 Apr. 81)

81B270. Effects of intracerebroventricular injection of clonidine on metabolic, respiratory, vasomotor and temperature responses in the rabbit.

M. T. Lin, J. J. Jou & W. C. Ko

Dept. of Physiology and Biophysics, National Defence Medical Center, Taipei Taiwan, Naunyn-Schmiedeberg's.

Archives of Pharmacology, **315**, 195 (Jan. 81).

R81B271. Genotypic influences on striatal dopaminergic regulation in mice.

J. S. Severson, P. K. Randall & C. E. Finch

Andres Gerontology Center, Dept. of Biological Sciences, University of Southern California, Los Angeles, California 90007 USA.

Brain Research, **210**, 201 (6 Apr. 81)

R81B272. Human brain monoamine oxidase: one molecular entity-multiple binding sites?

A. Schurr, B. T. Ho & J. C. Schoolar

University of Texas Health Science Center at Houston, Dept. of Neurobiology & Anatomy, P. O. Box No. 20708, Houston, Texas 77025, USA.

J. of Pharmacy & Pharmacology, **33**, 165 (Mar. 81)

R81B273. Human epileptic neurons studies in vitro.

D. A. Prince & R. K. S. Wong

Dept. of Neurology, Stanford University School of Medicine, Stanford, California 94305, USA.

Brain Research, **210**, 323 (6 Apr. 81)

K81B274. Immunohistochemical localization of galactosyl and sulfogalactosyl ceramide in the brain of the 30-day old mouse.

B. Zalc, M. Monge, P. Dupouey, J. J. Hauw & N. A. Baumann

Laboratoire de Neurochimie, INSERM U 134, France.

Brain Research, **211**, 341 (4 May 81)

R81B275. The influence of pre-and postnatal undernutrition on the developing brain stem reticular core: A quantitative golgi study.

R. P. Hammer, Jr.

Laboratory of Neurophysiology, Building 36, Room 2-D-10, National Institute of Mental Health, Bethesda, MD-20205, USA.

Developmental Brain Research, **1**, 191 (Apr. 81)

R81B276. Inhibition by anti-inflammatory drugs of prostaglandin production in cultured macrophages.

K. Brune, K. D. Rainsford, K. Wagner, B. A. Peskar

Pharmakologisches Institut, Biozentrum, Klingelbergstrasse 70, CH-4056 Basel, Switzerland.

Naunyn-Schmiedeberg's-Archives of Pharmacology, **315**, 269 (Jan. 81)

R81B277. The insensitivity of developing benzodiazepine receptors to chronic treatment with diazepam, GABA and muscimol in brain cell cultures.

D. B. Shibla, M. A. Gardell & J. H. Neale

The Dept. of Biology, Georgetown University, Washington DC 20057, USA.

Brain Research, **210**, 471 (6 Apr. 81)

R81B278. Interaction of catecholamines and ethanol on the kinetics of rat brain ($\text{Na}^+ + \text{K}^+$)-ATPase.

H. Kalant* & N. Rangaraj

Dept. of Pharmacology, Medical Sciences Building, University of Toronto, Toronto, Canada M5S 1A8.

European J. of Pharmacology, **70**, 157 (12 Mar. 81)

R81B279. Intracerebral substance P in mice: behavioral effects and narcotic agents.

N. N. Share & A. Rackham

Laboratoires Merck Sharp and Dohme-Chibret, BP 88, Route de Marsat 63203 Riom Cedex, France.

Brain Research, **211**, 379 (4 May 81)

R81B280. Intraspinal distribution and reaction in the grey matter with tetanus toxin of intracisternally injected antitetanus toxoid F(ab')₂ fragments.

G. Erdmann, A. Hanauske, H. H. Wellhoner*

Dept. of Toxicology, Medizinische Hochschule Hannover, D-3000 Hannover 61, Federal Republic of Germany.

Brain Research, **211**, 367 (4 May 81)

R81B281. In vivo intraneuronal M₁ inhibition in rat brain by SKF 641 comparison to other potent PNM inhibitors.

I. N. Mefford, K. A. Rath, M. Gilbo & J. D. Barchas

Nancy Pritzker Laboratory of Behavioral Neurochemistry, Dept. of Psychiatry and Behavioral Sciences, Stanford University School of Medicine, Stanford, California 94305, USA.

European J. of Pharmacology, **70**, 345 (Mar. 81)

R81B282. Levonantradol, a potent cannabinoid-related analgesic, antagonises haloperidol-induced activation of striatal dopamine synthesis.

B. Kenneth Koe

Dept. of Pharmacology, Central Research, Pfizer Inc. Groton, CT 06340 USA.

European J. of Pharmacology, **70**, 231 (Mar. 81)

R81B283. Morphiceptin ($\text{NH}_2\text{-Tyr-Pro-Phe-Pro-CONH}_2$): a potent and specific agonist for morphine (μ) receptors.

K. J. Chang, A. Killian, E. Hazu P. Cuatrecasas & J. K. Chang

Dept. of Molecular Biology, Wellcome Research Laboratories, Research Triangle Park, North Carolina 27709, USA.

Science, **212**, 75 (3 Apr. 81)

R81B284. Morphological development of the brain stem reticular core in prenatally undernourished rats.

R. P. Hammer Jr. & E. V. Marthens

Laboratory of Neurophysiology, Building 36, Room 2-D-10, National Institute of Mental Health, Bethesda, MD 20205, USA.

Developmental Brain Research, **1**, 203 (Apr. 81)

R81B285. Neurotensin release by rat hypothalamic fragments *in vitro*.

K. Maeda & L. A. Frohman*

Division of Endocrinology and Metabolism, Michael Reese Medical Center, 29005, Ellis Avenue, Chicago III 606616, USA.

Brain Research, **210**, 261 (6 Apr. 81)

R81B286. Ontogenetic development of high potassium and acetylcholine-induced release of dopamine from striatal slices of the rat.

Y. Nomura, I. Yotsumoto & T. Segawa

Dept. of Pharmacology, Institute of Pharmaceutical Sciences, Hiroshima University, School of Medicine, Kasumi 1-2-3, Minami-Ku, Hiroshima, 734, Japan.

Developmental Brain Research, **1**, 171 (Apr. 81)

R81B287. Regional distribution of (3H) imipramine binding in rat brain.

M. Palkovits, R. Raisman, M. Briley, & S. Z. Langer*

LEERS Synthelabo, Dept. of Biology, 58 Rue de la Glaciere, 75013 Paris, (France).

Brain Research, **210**, 493 (6 Apr. 81).

R81B288. Relative activities of substances related to 5-hydroxytryptamine as depolarizing agents of superior cervical ganglion cells.

D. Wallis & H. Nash

Dept. of Physiology, University College, P. O. Box 78, Cardiff CF1 1X1, Great Britain.

European J. of Pharmacology, **70**, 381 (26 Mar. 81)

R81B289. Selective antagonists of benzodiazepines.

W. Hunkeler, H. Mohler, L. Pieri, P. Pole, E. P. Bonetti, R. Cumin, R. Schaffner & W. Haefely*

Pharmaceutical Research Department, F. Hoffmann-La Roche & Co. Ltd., CH-4002, Basel, Switzerland.

Nature, **290**, 514 (9 Apr. 81)

R81B290. Sensory neurotoxins: Chemically induced selective destruction of primary sensory neurons.

G. Jancso & E. Kiraly

Dept. of Anatomy, University Medical School, 6701, Szeged, P. O. Box 512, Hungary.

Brain Research, **210**, 83 (6 Apr. 81)

R81B291. Sexual behavior decreases pain sensitivity and stimulates endogenous opioids in male rats.

H. Szechtman, M. Hershkowitz & R. Simantov

Dept. of Neurosciences, McMaster University, Hamilton Ontario, Canada L5S 375.

European J. of Pharmacology, **70**, 279 (26 Mar. 81)

R81B292. Single cell activity in ventral prefrontal cortex of behaving monkeys.

C. E. Rosenkilde, R. H. Bauer & J. M. Fuster

Dept. of Neuroscience, Albert Einstein College of Medicine, Bronx, NY 10461, USA

Brain Research, **209**, 375 (30, Mar. 81)

R81B293. Solubilization of neuroleptic/dopamine receptors of human brain striatum.

A. Davis, B. Madras & P. Seeman

Dept. of Psychopharmacology, Clarke Institute of Psychiatry, 250 College Street, University of Toronto, Toronto, Ontario M5T 1R8, UK.

European J. of Pharmacology, **70**, 321 (26 Mar. 81)

R81B294. Spreading depression induced by microinjection of enkephalins into the hippocampus and neocortex.

U. Sprick, M. S. Oitzi, K. Ornstein & J. P. Huston

Institute of Psychology 111, University of Diisseldorf, Universitätsstrasse I, 4000 Diisseldorf, Federal Republic of Germany.

Brain Research, **210**, 243 (6 Apr. 81)

R81B295. Stimulation in infancy facilitates interhemispheric communication in the rabbit.

V. H. Denenberg, L. Zeidner, G. Rosen, M. Holmann, J. A. Garbana G. F. Sherman & D. A. Yutzey

Dept. of Biobehavioral Science & Psychology, University of Connecticut Storrs, Conn 06268, USA.

Developmental Brain Research, **1** 165 (Apr)

R81B296. Substance P immunoreactive neurons following neonatal administration of capsaicin.

A. C. Cuello, R. Gamse, P. Holzer & F. Lembeck

Dept. of Pharmacology and Human Anatomy, University Oxford, South Parks Road, Oxford OX13 QT, Great Britain

Naunyn-Schmiedeberg's-Archives of Pharmacology, **315**, 185 (Jan. 81)

R81B297. Topographical localization of choline acetyltransferase with the human spinal cord and a comparison with some other species.

S. M. Aquilonius, S. A. Eckernas & P. G. Gellberg

Dept. of Neurology, University Hospital S-75014, Uppsala, Sweden.

Brain Research, **210**, 329 (4 May 81)

R81B298. Trigemino-cerebellar mossy fiber branching to granule cell layer patches in the rat cerebellum.

D. C. Woolston, J. Kassel & J. M. Gibson

Dept. of Neurophysiology, University of Wisconsin, Madison, Wisc 53706, USA.

Brain Research, **209**, 255 (Mar. 81)

CARDIOVASCULAR SYSTEM

R81C095. Actions of dopamine and pomorphine on the vasoconstrictor responses of perfused mesenteric arteries of mouse, rat and rabbit.

N. Anwar & D. F. J. Mason*

Dept. of Pharmacology, St. Bartholomew's Hospital Medical College, Charter House Square, London EC1M 6BQ, UK.

J. of Pharmacy & Pharmacology, **33**, 150 (Mar. 81)

R81C096. Antiarrhythmic evaluation of verapamil, nifedipine, perhexiline and SKF 525-A in four canine models of cardiac arrhythmias.

J. L. Bergey, J. D. Meeallum & K. Nocella

Wyeth Laboratories Inc., P. O. Box 8299, Philadelphia, Pa 19101, USA.

European J. of Pharmacology, **70**, 331 (26 Mar. 81).

R081C097. Cardiac pacing in India. (A Perspective and prospective study).

A. K. Basu†

J. of the Indian Medical Association, **75**, 205 (16 Nov. 80)

†Address not available.

R81C098. Covariance of plasma free 3-methoxy-4-hydroxyphenethyl glycol and diastolic blood pressure.

J. F. Leckman*, J. W. Maas & G. R. Heninger

Yale University Child Study Center, 333 Ceden Street, New Haven, CT 06510, USA.

European J. of Pharmacology, **70**, 111 (12 Mar. 81)

R81C099. The effect of salbutamol on the membrane potential of normal and depolarised rat diaphragm muscle.

R. Whittaker, M. R. Cardwell

School of Pharmacy, Liverpool polytechnic, Byrom Street, Liverpool, L3 3AF, UK.

J. of Pharmacy & Pharmacology, **33**, 177 (Mar. 81)

R81C100. Enhanced thromboxane A₂ biosynthesis in the kidney of spontaneously hypertensive rats during development of hypertension.

Y. Shibouta, Z. Terashita, Y. Inada, K. Nishekawa* & S. Kikuchi

Medicinal Research Laboratories, Central Research Division, Takeda Chemical Industries Ltd., Yodogawa-Ku, Osaka, 532, Japan.

European J. of Pharmacology, **70**, 247 (26 Mar. 81)

R81C101. Fibrinolysis with acyl-enzymes: a new approach to thrombolytic therapy.

R. A. G. Smith, R. J. Dupe, P. D. English & J. Green

Beecham Pharmaceuticals Research Division, Biosciences Research Centre, Great Burgh, Yew Tree Bottom Road, Epsom, Surrey KT18 5XQ, UK.

Nature, **90**, 505 (9 Apr. 81)

R81C102. Yohimbine diastereoisomers: cardiovascular effects after central and peripheral application in the rat.

R. W. Rockhold & F. Gross

Dept. of Physiology and Biophysics, University Tennessee Center for Health Sciences, 894 Union Avenue, Memphis, TN 38163, USA.

Naunyn-Schmiedebergis (Archives of Pharmacology), **315**, 227 (June 81)

D RESPIRATORY SYSTEM

R81C018. Characterization of the respiratory activity of (D-Ala³) methionine-enkephalinamide.

R. H. Zobrist, H. W. Allerton & G. E. Isom*

Dept. of Pharmacology & Toxicology, School of Pharmacy & Pharmacological Sciences, Purdue University, West Lafayette, Indian 47907, USA.

European J. of Pharmacology, **70**, 121 (12 Mar. 81)

R81D019. Potentiation of the morphine-induced respiratory rate depression by captopril.

S. Oktay, R. Onur, M. Ilhan, & R. K. Turker

A. U. Tip Fakultesi Farmakoloji Kursusu, Sihhiye, Ankara, Turkey.

European J. of Pharmacology, **70**, 257 (12 Mar. 81)

R81D120. Slow-reacting substance (Leukotrienes) contract human airway and pulmonary vascular smooth muscle *in vitro*.

C. J. Hanna, M. K. Bach, P. D. Pare & R. R. Schellenberg

University of British Columbia, Pulmonary Research Laboratory, 1081 Burrard Street, Vancouver, British Columbia, Canada V6Z 1Y6.

Nature, **290**, 343 (26 Mar. 81)

E GASTROINTESTINAL DISORDERS

R81E029. The influence of cimetidine, a histamine H₂-receptor antagonist, on the gastric effects of reserpine in rats.

H. K. Lau & C. W. Ogle*

Dept. of Pharmacology, Faculty of Medicine, University of Hong Kong, Hong Kong.

European J. of Pharmacology, **70**, 139 (12 Mar. 81)

R81E030. The inhibitory effect of paracetamol on the electrically stimulated ileum of the guinea pig.

Lynne Miller, J. S. Shaw

Biology Department, ICI Ltd. Pharmaceuticals Divisions, Alderley Park, Macclesfield, Cheshire, SK10 4TG, UK.

J. of Pharmacy & Pharmacology, **33**, 188 (Mar. 81)

R81E031. The role of zinc ion in the development of gastric ulcers in rats.

G. Oner*, N. M. Bor, E. Onuk & Z. N. Oner

University of Calgary, Faculty of Medicine, Division of Pharmacology & Therapeutics, 2920-24 Ave., N. W. T2N 1N4 Calgary, Alberta, Canada.

European J. of Pharmacology, **70**, 241 (12 Mar. 81)

F METABOLIC AND DEGENERATIVE DISORDERS

R81F060. Ammonia and disinhibition in cat motor cortex by ammonium acetate, monofluoroacetate and insulin-induced hypoglycemia.

W. A. Raabe

Department of neurology, Veterans Administration Medical Center and University of Minnesota, Minneapolis, Minn 55417 (USA)

Brain Research, **210**, 311 (6 April 81)

R81F061. Anabolic and catabolic pathways of pyrimidine metabolism in rat liver.

E. H. Harley and M. J. Losman

Department of Chemical Pathology, University of Cape Town, Medical School, Observatory 7925 Republic of South Africa.

International J. of Biochemistry, **13**, 247 (1981)

R81F062. Autonomic neuropathy in diabetes mellitus.

J. L. Noronha, S. D. Bhandarkar, P. N. Shenoy & Vimla J. Retnam

Division of Endocrinology and Metabolic Disorders and the Department of Cardiology, K. E. N. Hospital, Bombay-400 012.

J. of Postgraduate Medicine, **27**, 1 (Jan 81)

R81F063. Calcium and pancreatic β -cell function. 12. Modification of ^{45}Ca fluxes by excess of K.

T. Andersson, C. Betsholtz and B. Hellman

Department of Histology, Biomedicine, University of Uppsala, S-75123 Uppsala Sweden.

Acta Endocrinologica, **96**, 87 (Jan. 81)

R81F064. Calcium potentiates the peroxidation of erythrocyte membrane lipids.

S. K. Jain & S. B. Shohel*

Cancer Research Institute, Division of Hematology, School of Medicine, University of California, San Francisco, CA 94143 (USA).

Biochemica et Biophysica Acta, **642**, 46 (20 March 81)

R81F065. The Dependence of the conductance and life time of gramicidin channels on the thickness and tension of lipid bilayers.

V. S. Rudnev, L. N. Ermishkin, L. A. Fonina and Yu. G. Rovin

Institute of Chemistry, Academy of Sciences, U. S. S. R.

Biochemica et Biophysica Acta, **642**, 196 (20 March 1981)

R81F066. Determinations of redox states in A₁ and B-Cell rich islet specimens from guinea pigs, using bioluminescence assay of NAD and NADH.

S. E. Brolin, A. Agren* and B. Petersson

Department of Histology, Box 571, S 75123, Uppsala, Sweden.

Acta Endocrinologica, **96**, 93 (Jan. 81)

R81F067. Distribution of lipoproteins triglyceride and lipoprotein cholesterol in an adult population by age, sex, and hormone use.

P. W. Wahl, G. R. Warnick, J. J. Albers, J. J. Hoover, C. E. Walden, R. O. Bergelin, J. T. Ogilvie, W. R. Hazzard and R. H. Knopp.

Northwest Lipid Research Clinic, 325 9th Avenue, Seattle, WA 98104, USA.

Atherosclerosis, **39**, 111 (April 81)

R81F068. Effect of amino acids on insulin stimulated glucose metabolism in fat cells.

T. Mizunuma, Y. Takahashi and H. Oku

Department of Nutrition, School of Medicine, Tokushima University, Kuramoto, Tokushima, Tokushima 770.

J. of Biochemistry, **89**, 407 (Feb. 1981)

R81F069. Effect of ascorbic acid on plasma lipids and lipoproteins in healthy young women.

A. R. Khan & F. A. Seedarnee

Department of Dietetics and Nutrition, Florida International University, School of Technology, Miami, FL 33199, USA.

Atherosclerosis, **39**, 89 (April 81)

R81F070. The effect of fried versus raw garlic on fibrinolytic activity in man.

S. K. Chutani and A. Bordia*

Department of Medicine and Indigenous Drug Research Centre, Tagore Medical College, Udaipur (India).

Atherosclerosis, **38**, 417 (Feb.-March 81)

R81F071. Effects of lipoproteins on plasma viscosity.

A. H. Sepowitz, Shu Chien & F. R. Smith

Columbia University, College of Physicians and Surgeons, 630 West 68th Street, New-York, NY 10032, USA.

Atherosclerosis, **38**, 89 (Jan./Feb. 81)

R81F072. Effects of somatostatin on insulin, glucagon and aminoacids in cirrhosis of the liver.

B. Limberg & B. Kommerell

Medizinische Universitätsklinik, A6 Abteilung für Gastroenterologie, Heidelberg, West Germany.

IRCS Medical Science, **9**, 164 (Feb. 81)

R81F073. Effects of triton WR-1339 on lipoprotein lipolytic activity and lipid content of rat liver lysosomes.

H. Hayashi, S. Niinobe, Y. Matsumoto & T. Suga

Department of Physiological Chemistry, Faculty of Pharmaceutical Sciences, Josai University, Sakado, Saitama 350-02.

J. of Biochemistry, **89**, 573 (Feb. 81)

R81F074. Electrostatic control by lipids upon the membrane-bound $(Na^+ + K^+) = ATPase$.

M. L. Ahrens

Max-Planck Institute für Biophysikalische Chemie, Am Fassberg 3400 Göttingen, FRG.

Biochimica et Biophysica Acta, **642**, 252 (6 April 81)

R81F075. Elevation of serum HDL & HDL cholesterol in cholesterol-fed male rabbits treated with estrogen.

T. I. Pynadath & S. Chanapai

Kent State University, Kent OH 44242, USA.

Atherosclerosis, **38**, 255 (Feb.-March 81)

R81F076. Evidence that phosphatidic acid stimulates the uptake of calcium by liver cells but not calcium release from mitochondria.

G. J. Barritt, K. A. Dalton & J. A. Whiling

Clinical Biochemistry Unit, Flinders University School of Medicine, Flinder Medical Centre, Bedford Park SA 5042 Australia.

FEBS Letters, **125**, 137 (23 March 81)

R81F077. Failure of thyroid hormones to maintain the normal lipoprotein pattern in rats after removal of the pituitary gland.

M. Malkonen and V. Manninen

Wihuri Research Institute, SF-00146 Helsinki 14, Finland.

Atherosclerosis, **38**, 121 (Jan./Feb 81)

R81F078. Fenofibrate therapy of hyperlipoproteinaemia: A dose response study and a comparison with clofibrate.

S. Rossner and L. Oro

Department of Internal Medicine Karolinska Hospital and Ersta Hospital and King Gustaf V. Research Institute, Stockholm Sweden.

Atherosclerosis, **38**, 273 (Feb./March 81)

R81F079. General method for the Purification of lipids surface pressure studies. Application to monogalactosyldiglyceride.

P. Tancrede*, G. Chauvette & R. M. Leblanc

Groupe de Recherche en Biophysique, Department de Chimie-Biologie, Université du Québec a Trois Rivières, Trois-Rivières, Québec, G 9A5H7, Canada.

J. of Chromatography, **207**, 387 (27 March 81)

R81F080. Genetic difference in the sympathetic nervous activity and susceptibility to atherosclerosis in pigeon.

K. Fronck & N. Alexander

AMES-Bioengineering, M-005, University of California, San Diego, La Jolla, CA 92093 USA.

Atherosclerosis, **39**, 25 (April 81)

R81F081. Y-Glutamyltransferase from human hepatoma tissue in comparison with normal liver enzyme.

Hideo Yamamoto, K. Sumikawa, T. Hada, K. Higashino & Y. Yamamura

Third Department of Internal Medicine, Osaka University School of Medicine, Fukushima, Osaka 553, Japan.

Clinica Chimica Acta, **111**, 229 (9 April 81)

R81F082. Y-Glutamyltranspeptidase activity in pancreatic islets.

K. Anjaneyulu, R. Anjaneyulu, A. Sen & W. J. Malaisse

Laboratory of Experimental Medicine, Brussels Free University, B-1050 Brussels Belgium.

FEBS Letters, **125**, 57 (9 March 81)

R81F083. Hyperlipidemia in guinea-pigs induced by ascorbic acid deficiency. The effects of cholesterol, DL-ethionine and aflatoxin.

F. Yokota, Y. Igarashi and R. Suzue

The National Institute of Nutrition, 1-1-1 Toyama-Cho-shinjuku, Tokyo 162, Japan

Atherosclerosis, **38**, 249 (Feb/March 81)

R81F084. Hyperlipidemia, diabetes mellitus, hyperprolactinaemia, retarded growth and delayed puberty in a 14 year old girl, effect of bromocriptine treatment.

N. C. Christensen, C. Hagen, M. D. Nielsen & S. Petersen

Department of Paediatrics, Glostrup Hospital, D. K-2600 Glostrup, Denmark

Acta Endocrinologica, **96**, 30 (Jan 81)

R81F085. Hypoparathyroidism in diabetes mellitus.

P. McNair, M. S. Christensen, S. Madsbad, C. Christiansen & I. Trans

Department of Clinical Chemistry, Glostrup Hospital, D. K-2600 Glostrup, Denmark

Acta Endocrinologica, **96**, 81 (Jan 81)

R81F086. Insulin: a role in uterine physiology.

Steinsapir, A. M. Rojas & A. N. Chernitchin

Department of Physiology & Biophysics,
and Laboratory of Experimental Endocrinology,
University of Chile Medical School, Santiago, Chile.

IRCS Medical Science, **9**, 139 (Feb. 81)

R81F087. In vitro characterization of the mechanism of insulin degradation and the effect of chloroquine.

J. S. Tsai & M. Seeman

Endocrine Division, Dept. of Medicine,
New York University Medical Center,
550 First-Avenue, New York, NY 10016,
USA.

Biochemica et Biophysica Acta, **673**, 259 (18 March 81)

R81F088. Lack of prolactin response to insulin induced hypoglycaemia in uraemic patients.

M. Lunetta, E. Infantone, D. Spanti & L. Mughini

Department of Metabolic Diseases &
Department of Nephrology, University
of Catania, Italy.

IRCS Medical Science, **9**, 141 (Feb 81)

R81F089. A lipoprotein independent assay for human serum lecithin-cholesterol acyltransferase.

R. J. Morin and Ure Piran

Department of Pathology, Los Angeles
County Harbor-UCLA Medical Center
1000 W Carson Street, Torrance, CA
90509 (USA)

Clinica Chimica Acta, **111**, 211 (9 April 81)

R81F090. Metabolism of aflatoxin B₁ in the isolated nuclei of rat liver.

H. Yoshizawa, R. Uchimaru & Y. Ueno*

Department of Toxicology and Microbiol
Chemistry, Faculty of Pharmaceutical
Sciences, Tokyo University of Science,
Ichigaya, Shinjuku-ku, Tokyo, 162.

J. of Biochemistry, **89**, 443 (Feb. 81)

R81F091. Metabolism of bile alcohols, 24-Nor-5 β Cholestane-3_a, 7_a, 12_a, 2-tetrol and 3_a, 7_a, 12_a-Trihydroxy 26, 27-dinor-5 β -cholestan-2-one, in rats.

A. Kibe, M. Fukura, K. Kihira,
T. Kuramoto & T. Hoshita*

Institute of Pharmaceutical Sciences,
Hiroshima University of Medicine,
Kasumi, Minami-Ku, Hiroshima 734.

J. of Biochemistry, **89**, 369 (Feb 81)

R81F092. Metabolism of HDL₂ and HDL₃ cholesterol by monolayers of rat hepatocytes.

G. C. Ghiselli, R. Angelucci, A.
Regazzoni & C. R. Sortori

Institute of Pharmacology & Pharmacog-
nosy, University of Milan, Via Andrea
del Sarto 21, 20129 Milano, Italy.

FEBS Letters, **125**, 60 (9 March 81)

R81F093. Permeability in atherosclerosis an artefact with ivans' Blue Staining.

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Department of Pathology, Guy's Hospital Medical School, St. Thomas' Street London, SE 19RT, Great Britain.

Atherosclerosis, 39, 131 (April 81)

R81F094. Photometric measurement of lipoprotein—cholesterol after agarose electrophoresis: comparison with single-spin ultracentrifugal analysis.

C. Camejo, M. M. Cortez, C. Lopez & B. Mosquera

Laboratorio de lipoproteinas, Centre de Biofisicay Bioquimica, Institute Venezolano de Investigaciones Cientificas (IVIC), Apartado 1827, Caracas 1010A, Venezuela.

Clinica Chemica Acta, 111, 239 (9 April 81)

R81F095. Presence of 2' 5' a synthetase in dog liver.

Institute of Interdisciplinary Research, School of Medicine and Biology, Euratom Department, rue Evers 2, 1000 Brussels.

FEBS Letters, 125, 146 (23 March 81)

R81F096. Reduced triglyceridemia and increased high density lipoprotein cholesterol levels after treatment with acipimox, a new inhibitor of lipolysis.

C. R. Sirtori, G. Gianfranceschi, M. Sirtori, F. Bernini, G. Descovich, U. Montaguti, L. M. Fuccella and L. Musatti*

Therapeutic Research Department Farmitalia Carlo Enba S. P. A., Via Imbona 24, 20159 Milan, Italy.

Atherosclerosis, 38, 267 (Feb/March 81)

R81F097. The relationship between plasma membrane lipid composition and physical-chemical properties.

1. Fluorescence polarization studies of fatty acid-altered EL4 tumor cell membranes.

E. McVey, J. Yguerabide, D. C. Hanson & W. R. Clark*

Department of Biology, the Molecular Biology Institute, University of California Los Angeles, CA 90024, USA.

Biochemica et Biophysica Acta, 642, 106 (2 March 81)

R81F098. Selection of a strain of rats with spontaneous high cholesterolemia.

J. P. Boissel, B. Crouzet, M. C. Bourdillon & N. Blaes

INSERM, Unit 63, 22 Avenue du docteur Lepine, 69500 Bron, France.

Atherosclerosis, 39, 11 (April 81)

R81F099. Specificity of a rat liver protein phosphatase active on caseins phosphorylated by two CAM independent protein kinases: 'Casein' phosphatase and the 'multifunctional' phosphatase are different enzymes.

A. Donella Deana, F. Meggio & L. A. Pi

Institute of Biological Chemistry, University of Padova, Via Marzolo, 3, 35100 Padova, Italy.

FEBS Letters, 125, 77 (9 March 1981)

**R81F100. Structure of 1-acyl
phosphatidylcholine and fatty
acid complex in bilayers.**

C. K. Jain & G. H. DeHaas

Department of Chemistry, University of
Delaware, Newark, DE 19711, USA.

Biochimica et Biophysica Acta, **642**, 203
(20 March 81)

**R81F101. Studies of esterified
cholesterol in sub-fractions of
plasma high density lipoproteins.**

P. J. Barter, Y. C. ha & G. D. Calvert

The Unit of Clinical Biochemistry, School
of Medicine, Flinders University of South
Australia, Bedford Park 5042, South
Australia.

Atherosclerosis, **38**, 165 (Jan/Feb 81)

**R81F102. Study on triglyceride
and phospholipid in puerperium.**

R. N. Bhowmick

Department of Obstetrics and Gynaecology, N. B. Medical College, Sushrut
tanagar Siliguri, Darjeeling, West Bengal.

J. of Obstetrics and Gynaecology of India, **30**,
929 (Dec. 1980)

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brain fuels reduces body weight and
food intake in rats.**

J. D. Davis, D. Wirtshafter, K. E. Asin &
D. Brief

Department of Psychology, University of
Illinois, Chicago 60680.

Science, **212**, 81 (3 April 81)

**R81F104. Vasopressin analogs that
antagonize antidiuretic responses
by rats to the antidiuretic hormone.**

W. H. Sawyer, P. K. T. Pang, J. Seto,
M. McEnroe, B. Lammek & M. Manning.

Department of Pharmacology, Columbia
University College of Physicians &
Surgeons, New York 10032.

Science, **212**, 49 (3 Apr. 1981)

G INFECTIOUS DISEASES

**R81G053. Selective antiviral activity
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oncogenic and neurotropic herpes-
viruses.**

M. D. Daniel, R. Tamulevich, J. G.
Bekesi, N. W. King, L. A. Falk, D. Silva
& J. F. Holland

New England Regional Primate Research
Center, Harvard Medical School, South-
boro, Mass, 01772, USA.

International J. of Cancer, **27**, 113,
(15 Jan. 1981)

R81G054. *In vitro* studies on the activities of cephalothin against selected bacteria.

Gohta Masuda, Taro Yajima, Kishio Nakamora, Nagayo Shimizu & Shigenori Tamagania

Department of Infectious Diseases, Tokyo Metropolitan Komagome Hospital 3-18-22 Honkemagome, Bunkyo-ku, Tokyo 113, Japan.

Japanes J. of Antibiotics, **34**, 199 (Feb 81)

R81G055. Relevance of 'in vitro' antibacterial activities of cefotiam and cefazolin to their therapeutic effects on experimental pneumonia caused by *Klebsiella pneumoniae* DT-S in mice.

Takeshi Nishi, Masafumi Nakao & Kanji Tsuchiya

Central Research Division, Takeda Chemical Industries Ltd, Osaka, Japan.

J. of Antibiotics, **34**, 231 (Feb 81)

R81G056. Sensitivity of Group B *Streptococcus* to various antibiotics.

T. Teramoto, M. Nutina & M. Koide, T. Haruta, Y. Morikawa, T. Fujiwara & Y. Kobayashi

Public Health Research Institute of Kobe City, Kobe, Japan.

Japanese J. of Antibiotics, **34**, 20 (Feb 81)

R81G057. Synthesis and structure-activity relationships of 7 β -[2-(2-Aminothiazol-4-yl) acetamido] cephalosporin derivatives. V. Synthesis and antibacterial activity of 7 β -[2-(aminothiazol-4-yl)-2-methoxyiminoacetamido]-cephalosporin derivatives and related compounds.

Michiliko Ochiai Akira Morimoto Toshio Iniyawaki Yoshiento Matsustrita, Tatsu Okada, Hideaki Natsugari, Makotokida.

Central Research Division, Takeda Chemical Ind. Ltd., Juso, Yodogawa-ku, Osaka 532, Japan.

J. of Antibiotics, **34**, 171 (Feb 81)

R81G058. Synthesis and structure-activity relationships of 7 β -[2-(2-Aminothiazol-4-yl) acetamido] cephalosporin derivatives : VI. Alternative derivatives.

M. Ochiai, A. Morimots & T. Miyavaki

Central Research Division, Takeda Chemical Ind. Ltd., Inso Yodogawaku, Osaka 532, Japan.

J. of Antibiotics, **34**, 186 (Feb 81)

H ANTINEOPLASTIC AGENTS

R81H010. BBM—928, A new antitumor antibiotic complex III. Structure determination of BBM-928 A, B & C.

Masataka Konishi, Hiroaki, Ohkuma, Fumihide Sakai, Takashi Tsuno, Hides

Koshiyama, Takayuki Naito & Hiroshi Kawaguchi

Bristoe-Banyu Research Institute, Ltd. Meguro, Tokyo, Japan.

J. of Antibiotics, **34**, 148 (Feb 81)

R81H011. Carcinomas induced by cell lines cultivated from normal mouse placentas.

T. Log, K. S. S. Charg & Y. C. Hsu

Laboratory of Cell Biology, National Cancer Institute, Bethesda, Maryland 20205, USA.

International J. of Cancer, **27**, 365 (15 March 81)

R81H012. Comparison of nuclear DNA-dependent RNA polymerases from mouse tumors and tissues of normal swiss mice.

D. G. R. Blair

Department of Biochemistry, University of Saskatchewan, Saskatoon, Saskatchewan, Canada S7N0W0.

International J. of Biochemistry, **13**, 207 (81)

R81H013. Effect of melatonin on transplanted P388 lymphocytic leukemia and Hela cells.

L. S. Kothari, P. N. Shah, A. D. Alate* & M. P. Chitmis

Division of Endocrinology & Division of Chemotherapy, Cancer Research Institute, Parel, Bombay-400 012, India.

IRCS Medical Science, **9**, 38 (Jan 81)

R81H014. Immunospecificity of antisera against nonhistone nuclear proteins of human lymphoid cells grown in culture.

R. D. Platz & S. E. Riordan

Department of Biology, Hood College, Frederick, MD21701.

Cell Differentiation, **10**, 117 (Mar 81)

R81H015. 'In vivo' formation of benzo (a) pyrene diol epoxide-deoxyadenosine adducts in the skin of mice susceptible to benzo (a) pyrene-induced carcinogenesis.

S. W. Ashurst & G. M. Cohen*

Toxicology Unit, School of Pharmacy, University of London, 29/39 Brunswick Square, London WC1N1AX, UK.

International J. of Cancer, **27**, 357 (15 Mar 81)

R81H016. A monosialoganglioside is a monoclonal antibody defined antigen of colon carcinoma.

J. L. Magnani, M. Brockhaus, D. F. Smith, V. Ginsburg, M. Blaszczyk, U. F. Mitchell, Z. Steplewski & H. Koprowski

National Institute of Arthritis, Metabolism & Digestive Diseases, National Institute of Health, Bethesda, Maryland 20205.

Science, **212**, 55 (3 April 81)

R81H017. Papain-derived fragment 11_c of tetanus toxin: its binding to isolated synaptic membranes and retrograde axonal transport.

B. Bizzini, P. Grob & K. Akert*

Brain Research Institute, University of Zurich, August Forelstrasse 1 CH8029 Zurich, Switzerland.

Brain Research, **210**, 291 (6 April 81)

R81H018. Specific antigen in serum of patients with colon carcinoma.

H. Koprowski, M. Herly, Z. Steplewski & H. F. Sears

Wistar Institute of Anatomy & Biology, Philadelphia, Pennsylvania 19104.

Science, **212**, 53 (3 Apr 81)

R81H019. The structure of antitumor antibiotics nocamycins I and II (In Russian).

M. G. Brazhnikova, N. V. Konstantinova, N. P. Patapova, I. V. Tolstych, L. M. Rubasheva, B. V. Rozynov, G. Horvath

Institute of New Antibiotics, Academy of Medical Sciences of the USSR, Moscow.

Bio-organic Chemistry, **7**, 298 (Feb 81)

BIOCHEMICAL PHARMACOLOGY

R81I040. Animal modelling of human polymorphic drug oxidation—the metabolism of debrisoquine and phenacetin in rat inbred strains.

S. G. Al-Dabbagh, J. R. Idle* & R. L. Smith

Department of Biochemical and Experimental Pharmacology, St. Mary's Hospital Medical School, Paddington, London, W2 1PG, UK.

J. of Pharmacy & Pharmacology, **33**, 161 (Mar 81)

R81I041. C-19393 S₁ and H₂, new carbapenem antibiotics III: Mode of action.

Yukimasa Nozaki, Fumiko Kawashima and Akira Imada

Microbiological Research Laboratories, Central Research Division, Takeda Chemical Industries, Ltd., Yodogawa-ku, Osaka 532, Japan.

J. of Antibiotics, **34**, 206 (Feb 81)

R81I042. C-19393 S₁ and H₂, new carbapenem antibiotics IV: inhibitory activity against β -Lactamases.

K. Okonogi, Y. Nozaki, A. Imada & M. Kuno

Microbiological Research Laboratories, Central Research Division, Takeda Chemical Industries Ltd., Yodogawa-ku, Osaka 532, Japan.

J. of Antibiotics, **34**, 212 (Feb 81)

R81I043. Cefonicid: A stable β -Lactamase inhibitor.

Rajanikant J. Mehta, David J. Newman, Betty annie Bowie, Claude H. Nash III & Paul Actor

Department of Microbiology, Smith Kline & French Laboratories, P. O Box 7929, Philadelphia, PA19101, USA.

J. of Antibiotics, **34**, 202 (Feb 81)

R81I044. (N_a+K^+) ATPase has one functioning phosphorylation site per subunit.

J. H. M. Peters, H. G. P. Swarts, J. J. H. M. de Pont, F. M. A. H. Schuurmans Stekhoven & S. L. Bonting

Department of Biochemistry, University of Nijmegen, Post Box 9101, 6500 HB Nijmegen, The Netherlands.

Nature, **290**, 338 (26 Mar 81)

R81I045. Co-culture of nerve cells and pancreatic islets.

E. L. Hooghe-Peters, P. Meda & L. Orci

Institute of Histology and Embryology, University of Geneva Medical School, 20 rue de l'Ecole de Medicine, CH-1211 Geneva 4, Switzerland.

Developmental Brain Research, **1**, 287 (April 81)

R81I046. Control over assembly of the mitochondrial inner membrane : selection by a performance criterion.

V. N. Lwzikov

Department of Subcellular Biogenesis, Belozersky Laboratory of Molecular Biology and Bio-organic Chemistry, Lomonosov State University, Moscow 117284, USSR.

FEBS Letters, **125**, 131 (23 Mar 81)

R81I047. Diversity of immunoglobulin expression in leukaemic cells resembling β -lymphocyte precursors.

L. B. Vogler, J. L. Preud'homme & M. Seligmann, W. E. Gattling, W. M. Crist, M. D. Cooper & F. J. Bollum

Laboratory of Immunochemistry and Immunopathology (INSER-MU) Institute de Recherches Sur les Maladies du Sang de l'Universite Paris VII, Laboratoire d'Oncologie et d'Immuno-Hematologie du CNRS, Hopital Saint Louis, 75475 Paris Cedex 10, France.

Nature, **290**, 339 (26 Mar 81)

R81I048. Endogenous and cholera toxin-catalyzed Adribosylation of a plasma membrane protein of RL-PR-C cloned rat hepatocytes.

S. K. Beckner & M. Blecher*

Department of Biochemistry, Georgetown University Medical center, Washington, DC 20007, USA.

Biochimica et Biophysica Acta, **673**, 477 (3 April 81)

R81I049. Enzymatic synthesis of tritium-labeled ATP from alanine (In Russian).

N. F. Myasoedov, O. B. Kuznetrova, T. YuLazurkina, M. D. Frank-Kamenetskaya

Institute of Molecular Genetics, Academy of Sciences of the USSR, Moscow.

Bio-organic Chemistry, **7**, 256 (Feb 81)

R81I050. Evidence for a dipeptide transport system in renal brush border membranes from rabbit.

V. Ganapathi, J. Mendicino & F. H. Leibach*

Department of Cell and Molecular Biology, Medical College of Georgia, Augusta, GA 30912.

Biochimica et Biophysica Acta, **642**, 381 (6 Apr 81)

R811051. Glucocorticoids enhance glucose uptake and effect differentiation and beta-adrenergic responsiveness in muscle cell cultures.

M. Schonberg, T. J. Smith*, A. Krich-evsky, & J. P. Bilezikian

Department of Medicine, College of Physician and Surgeons, Columbia University, New York, N. Y. 10032, USA.

Cell Differentiation, **10**, 101 (Mar 81)

R811052. Immunocytochemical localization of tyrosine hydroxylase in rat adrenal medulla by the peroxidase labeled antibody methods. Effects of enzyme activation on ultrastructural distribution of the enzyme.

J. K. Stephens, J. M. Masserane, P. R. Vulliet, N. Weiner & P. K. Nakane

Department of Pharmacology & Pathology, University of Colorado School of Medicine 4200 East 9th Avenue, Denver, Colo 80262, USA.

Brain Research, **209**, 339 (30, Mar 81)

R811053. Inhibitory effect of cholera toxin on human natural cell-mediated cytotoxicity and its augmentation by interferon.

A. Fuse, T. Sato, & T. Kuwata

Department of Microbiology, School of Medicine, Chiba University, Chiba 280, Japan

International J. of Cancer, **27**, 29 (15 Jan 81)

R811054. Interaction of concanavalin A with individual proteins from bacterial and mammalian ribosomes

S. Michel, J. J. Madjar, J. P. Reboud & A. J. Cozzone

Department of Molecular Biology, University of Lyon, 43 Blod du onze Novembre, 69622 Villeurbanne, France.

International J. of Biochemistry, **13**, 14 (1981)

R811055. Maintenance and dissolution of acetylcholine receptor clusters in the embryonic muscle cell membrane.

N. Orida & Mu-Ming Poo

Department of Immunopathology Scripps Clinic and Research Foundation, 10660 N Torrey Pines Road, La Jolla, California 92037, USA.

Developmental Brain Research, **1**, 29 (Apr 81)

R811056. A model for the pH dependence of drug-protein binding

J. A. Henry, A. W. Dunlop, S. M. Mitchell, P. Turner & P. Adams

Departments of Clinical Pharmacology and Medical Electronics, St Bartholomew Hospital, West Smithfield, London EC1A 7BE, U. K. and Computer Systems Laboratory, Queen Mary College London E14NS, U. K.

J. of Pharmacy and Pharmacology, **33**, 17 (Mar 81)

I057. New aspects of the physiological significance of LRH receptors in pituitary plasma membranes.

Kuhl & R. Baumann

Abteilung für gynäkologische Endokrinologie, Zentrum der Frauenheilkunde und Geburtshilfe, J. W. Goethe-Universität, Frankfurt and Main FRG.

Acta Endocrinologica, **96**, 36 (Jan. 81)

R81I058. Polypeptide-binding membrane receptors: analysis and classification.

Kaplan

Department of Pathology, University of Utah Medical School, Salt Lake City 84132.

Science, **212**, 14 (3 April 81)

R81I059. A relationship between anion transport and structural transition of the human erythrocyte membrane.

J. W. Snow, J. Vincentelli and J. F. Brandts

Department of Chemistry, University of Massachusetts, Amherst, MA 01003, USA.

Biochemica et Biophysica Acta, **642**, 418 (6 April 81)

R81I060. Structural aspects of the catalytic and regulatory function of glycogen phosphorylase.

V. Dombradi

Institute of Medical Chemistry, University of Medicine, H. 4026 Debrecen, Bem ter 18/6 Hungary.

International J. of Biochemistry, **13**, 125 (1981)

R81I061. Theoretical conformational analysis of bradykinin-politiating peptides via conformational mobility of the backbone and side chains of the low-energy structures of Glu-Lys-Trp-Ala-Pro and Glu-Lys-Trp-Pro-Pro (In Russian).

N. N. Sevastyanova, E. M. Popov

M. M. Shemyakin Institute of Bioorganic Chemistry, Academy of Science of the USSR, Moscow.

Bio-organic Chemistry, **7**, 189 (Feb 81)

R81I062. A theoretical conformational study of substituted O-anisamides as models of a class of dopamine antagonists.

A. Pannatier, L. Anker, B. Testa* and P. A. Carrupt

School of Pharmacy, University of Lausanne, CH-1005, Lausanne, Switzerland.

J. of Pharmacy & Pharmacology, **33**, 145 (Mar 81)

R81J044. Aberrant rearrangements contribute significantly to the allelic exclusion of immunoglobulin gene expression.

C. Coleclough, R. P. Perry, K. Karjalainen & M. Weigert

Institute for Cancer Research, Fox Chase Cancer Center, Philadelphia, Pennsylvania 19111, USA.

Nature, **290**, 372 (2 April 81)

R81J045. Biggest challenge since the double helix.

R. Lewin†

Science, **212**, 28 (3 April 81)

R81J046. Direct role of the *him A* gene product in phage integration.

H. I. Miller & H. A. Nash

Department of Molecular Biology, University of California, Berkeley, California 94720, USA.

Nature, **290**, 523 (9 April 81)

R81J047. Distinctive features of the 5'-terminal sequences of the human mitochondrial mRNAs.

J. Montoya, D. Ojala & G. Attardi

Division of Biology, California Institute of Technology, Pasadena, California 91125, USA.

Nature, **290**, 465 (9 April 81)

R81J048. Evidences for a prepro-nerve growth factor (M_r 25000).

D. F. Catanzaro & B. J. Morris

Department of Physiology, The University of Sydney, N. S. W., 2006, Australia.

IRCS Medical Science, **9**, 52 (Jan. 81)

R81J049. Gas liquid chromatography of amino acids. The heptafluorofutyril-isobutyl ester derivative of tryptophan.

I. M. Moodie

Fishing Industry Research Institute, University of Capetown, Rondebosch 7700 South Africa.

J. of Chromatography, **208**, 60 (3 Apr 81)

R81J050. How conversational are genes ?

R. Lewin*

Science, **212**, 213 (17 April 81)

R81J051. Interferon-resistant cell line lacks fatty acid cyclooxygenase activity.

K. A. Chandrabose, P. Cuatrecasas, P. Pottathil & D. J. Lang

Department of Molecular Biology, Wellcome Research Laboratories, Research Triangle Park, North Carolina 27709 USA.

Science, **212**, 329 (17 Apr 81)

† Address not available.

R81J052. In vivo sequence requirements of the SV40 early promoter.

Christophe Benoist* & Pierre Chambon

Stanford University Medical School, Dept. of Genetics, Stanford, California 94305, USA.

Nature, **290**, 304 (26 March 81)

R81J053. Mechanism of codon-anticodon interaction in ribosomes.

V. Kirillov, V. I. Katunin & Y. P. Menkov

P. Konstantinov Nuclear Physics Institute, USSR Academy of Sciences, Gatchina, Leningrad district 188350, USSR.

EBS Letters, **125**, 15 (9 March 81)

R81J054. The Mechanism of replication of ϕ X 174.

XVIII Gene a and A* proteins of ϕ X174 bind tightly to ϕ X174 replicative form DNA.

L. Dubeau & D. T. Denhardt*
Cancer Research Laboratory, University of Western Ontario, London, Canada N6A5B7.

Biochimica et Biophysica Acta, **653**, 52 (26 March 81)

R81J055. Membrane protein oligomeric structure and transport function.

M. Klingenberg.

Institut für physikalische Biochemie der Universität München, Goethestrasse 33, 8000 München 2, Federal Republic of Germany.

Nature, **290**, 449 (9 April 81)

R81J056. Optimal in vitro conditions for conjugal transfer of R-plasmids from escherichia coli to salmonella typhi.

V. M. Rangnekar, V. V. Gadre, S. Mukerji & D. S. Chitnis

Hoffkine Institute, Parel, Bombay-400012.

Bulletin Hoffkine Institute, **7**, 23 (Dec. 79)

R81J057. Peptide bond synthesis catalysed by subtilisin, papain and pepsin.

K. Morihara & T. Oka

Shionogi Research Laboratories, Shionogi & Co., Ltd., Fukushima-Ku, Osaka, Osaka 553.

J. of Biochemistry, **89**, 385 (Feb 81)

R81J058. Phosphorylation and dephosphorylation of chromosomal proteins during in vitro transcription.

I. R. Phillips, E. A. Shephard, J. L. Stein & G. S. Stein

Department of Biochemistry & Molecular Biology, University of Florida, Gainesville, F. L. 32610, USA.

Cell Differentiation, **10**, 23 (Jan 81)

R81J059. Plasmids and bacterial pathogens.

J. R. Saunders

Department of Microbiology, University of Liverpool, Liverpool, UK.

Nature, 290, 362 (2 Apr 81)**R81J060. Processing of bacterial RNA.**

D. Apirion & P. Gegenheimer

Department of Microbiology & Immunology, Washington University School of Medicine, Box 8093, St. Louis, MO 63110, USA.

FEBS Letters, 125, 1 (9 March 81)**R81J061. Purification and characterization of a 43,000 dalton 'DNA-ase binding protein' distinct from action.**

K. Kohama & H. Holtzer

Department of Pharmacology, Faculty of Medicine, The University of Tokyo, Hongo, Bunkyo-ku, Tokyo 113.

J. of Biochemistry, 89, 341 (Feb 81)**R81J062. Purification of ribonuclease T₁ by affinity chromatography.**

S. Kanaya & T. Uchida

Mitsubishi-Kasei Institute of life Sciences, Minamiooya, Machida, Tokyo 194.

J. of Biochemistry, 89, 591 (Feb 81)**R81J063. Recalcitrant gonococci, plasmids, and antibiotics.***Lancet*, 1, 816 (11 April 1981)**R81J064. Regulation of small RNA in *Escherichia coli*. Alteration in the intracellular concentrations of small RNAs during amino acid and energy starvation.**

C. C. Rao and B. T. Dyess

Department of Biochemistry, University of Mississippi Medical Center, 2500, North State Street, Jackson, MS39216, USA.

Biochimica et Biophysica Acta, 653, 1 (1 March 81)**R81J065. Sensitive spray reagent for guanine nucleotides.**

Jose Sy and Michael Roselle

The Rockefeller University, 1230, York Avenue, New York, N. Y. 10021, USA.

J. of Chromatography, 208, 164 (3 Apr 81)**R81J066. Sequence and organization of the human mitochondrial genome**

S. Anderson, A. T. Bankier, B. G. Barrell, M. H. L. de Bruijn, A. R. Coulson, J. Drouin, I. C. Eperon

Medical Research Council Laboratory of Molecular Biology, Hills Road, Cambridge CB2 2QH, UK.

Nature, 290, 457 (9 Apr 81)

J067. Small is beautiful.

oust & L. A. Grivell

ion for Medical Enzymology, Laboratory of Biochemistry, University of Amsterdam, The Netherlands.

Nature, **290**, 443 (9 Apr 81)

J068. Structure of DNA.

Sasisekharan

molecular Biophysics Unit, Indian Institute of Science, Bangalore-560 012.

Current Science, **50**, 107 (5 Feb 81)

J069. Structure of tetanus toxin: the arrangement of papain digestion products within the heavy chain-light chain framework of extra-cellular toxin.

. Neubauer & T. B. Helting

Physiologisch-Chemisches Institut der Universität Marburg Lahnbergen, D3550 Marburg/Lahn, FRG.

Biochemica et Biophysica Acta, **668**, 141 (27 March 81)

R81J070. The SV40 early region TATA box is required for accurate *in vitro* initiation of transcription.

D. J. Mathis & Pierre Chmbon

Stanford University School of Medicine, Dept. of Medical Microbiology, Stanford, California, 95304 USA.

Nature, **290**, 310 (25 March 81)

R81J071. Thrombosis.

P. J. Gaffney

National Institute for Biological Standards & Control, London, U. K.

Nature, **290**, (9 April 81)

R81J072. tRNA Chemical methylation *in vitro* and *in vivo* formation of 1, 7-dimethylguanosine at high concentrations of methylating agents.

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Instituto di Chimica Biologica, Facolta di Scienze, Universita, di Bari, Via Amendola 165/A. 70126 Bari, Italy.

Biochemica et Biophysica Acta, **653**, 9 (26 March 81)

R81J073. +RNA punctuation model of RNA processing in human mitochondria.

D. Ojala, J. Montoya & G. Attardi

Division of Biology, California Institute of Technology, Pasadena, California 91125, USA.

Nature, **290**, 470 (9 April 81)

R81J074. Transferable ENT and HLY plasmids in R plasmid bearing *Escherichia coli* from normal individuals in Bombay.

V. M. Rangnekar, D. S. Chitnis, S. Mukerji & S. V. Gadre

Haffkine Institute, Parel, Bombay-400 012.

Bulletin Haffkine Institute, **7**, 1 (Dec. 79)

R81J075. Two mutations that alter the regulatory activity of *E. coli* rec A protein.

J. W. Roberts & C. W. Roberts

Section of Biochemistry, Cornell University, Ithaca, New York, 14853, USA.

Nature, 290, 422 (2 Apr 81)

K PHARMACEUTICS

R81K038. Blood-levels of sulflamoxole in goat.

H. N. Jha, M. K. Singh & N.C. Banerjee

Department of Pharmacology, Bihar Veterinary College. Patna 14.

Indian J. of Animal Health, 19, 119 (Dec. 80)

R81K039. Characterization of the induction of rug-metabolizing enzymes by 2-acetylaminofluorene.

Anders Astrom and J. W. DePierre

Department of Biochemistry, Arrhenius Laboratory, University of Stockholm, S-10691 Stockholm, Sweden.

Biochimica et-Biophysica Acta, 673, 225 (18 March 81)

R81K040. Chromatographic separation of some biogenic on a weakly acidic ion-exchange resin.

T. Seki

College of Biomedical Technology, Osaka University, Toyonaka Osaka 56 Japan.

J. of Chromatography, 207, 286 (20 Mar 81)

R81K041. Comparative pharmacokinetics of ampicillin and carbocillin in the cerebrospinal fluid of rabbits with staphylococcal meningitis with reference to half-life and areas under the curve.

Yoshiro Morikawa

Department of Pediatrics, Kobe Municipal Central Hospital, Kobe, Japan.

Japanese J. of Antibiotics, 34, 211 (Feb. 81)

R81K042. The constitution of zirconium and cerium sulphadiazines in aqueous preparation.

A. Bult, N. Hulsing, J. W. Weyland

Laboratory for Pharmaceutical and Analytical Chemistry, State University, Ant. Deusinglaan 2, 9713 AW Groningen The Netherlands

J. of Pharmacy & Pharmacology, 33, 1 (March 81)

K043. Determination of plasma catecholamines by means of radioisotopes labelling and high pressure liquid chromatographic separation.

a Appel, P. Bayer, P. Hajdu, D. Palm, Schofer and M. Uihlein

pt. of Pharmacology, Klinikum der hmann Wolfgang Goethe-Universitat, eodor-Stern-Kai, 7, D 6000 Frankfurt, ain.

unyn-Schmiedebergs Archives of Pharmacology, **315**, 233 (Jan. 81)

R81K044. Determination of the major metabolite of phentolamine in human plasma and urine by high-performance liquid chromatography.

. Godbillon & G. Carnis

Ciba-Geigy, Centre de Recherche Bipharmaceutique B. P. 308, 92506 Rueil Molmaison Cedex, France.

J. of Chromatography, **222**, 461 (13 March 81)

R81K045. Determination of serum electrolytes of frog-A biochemical project.

V. Rajasekharan, R. F. N. Ashok & K. Karunakaram

Post-Graduate Chemistry Department, V. O. Chidambaram College, Tuticorin-628 003.

Indian J. of Chemical Education, **7**, 10 (Dec. 80)

R81K046. Effect of degree of coating on column efficiency in liquid chromatography.

Y. H. Kin & A. Tishbee

Department of Organic Chemistry, The Weizmann Institute of Science, Rehovot, Israel.

J. of Chromatography, **207**, 245 (20 March 81)

R81K047. The effect of compression on the capillary microstructure of tablets.

F. Carli, I. Colombo, L. Simioni & R. Bianchini

Ricerca Sviluppo, Parmaceutico, Formitalia Carlo Erba, Via Imbonati 24, Milano, Italy.

J. of Pharmacy & Pharmacology, **33**, 129 (March 81)

R81K048. Effect of pH on the micellar properties of amphiphilic drugs in aqueous solution.

D. Attwood & R. Natarajan

Pharmacy Department, University of Manchester, Manchester, M 139 PL, UK.

J. of Pharmacy & Pharmacology, **33**, 136 (March 81)

R81K049. The effect of plasticizer type and concentration on the incidence of bridging of intagliations on film-coated tablets.

R. C. Rowe, S. F. Forse

ICI Pharmaceuticals Division, Alderley Park, Macclesfield, Cheshire SK 102TG, U. K.

J. of Pharmacy & Pharmacology, **33**, 174 (March 81)

R81K050. Effects of structural variations of non ionic surfactants on micellar properties and solubilization: surfactants containing very long hydrocarbon chains.

T. Arnarson & P. H. Elworthy*

Department of Pharmacy, The University, Manchester M139PL, UK.

J. of Pharmacy & Pharmacology, 33, 141 (March 81)

R81K051. An evaluation of four methods for the measurement of elastase activity.

D. H. McGillivray, D. Burnett, S. C. Afford & R. A. Stockley

Immunodiagnostic Research Laboratory, Department of Immunology, Birmingham Medical School, University of Birmingham B 152 TJ, UK.

Clinica Chemica Acta, 111, 289 (9 Apr. 81)

R81K052. Evaluation of capillary columns by separation number or plate number.

K. Grob, Jr.* & K. Grob

Kantonaes Laboratorium, Fehrenstrasse 15, P. O. Box, 8030 Zurich (Switzerland).

J. of Chromatography, 207, 291 (27 March 81)

R81K053. Gas chromatographic separation of amino and carboxylic acid enantiomers with α -hydroxy-carboxylic acid esters as chiral stationary phases.

Naobumi Oi, H. Kitahara & T. Doi

Institute for Biological Sciences, Sanyo Chemical Co. Ltd., 4-2-1-Takatsumakasa, Takarazuka-Shi: Hyogo-ken 626 Japan.

J. of Chromatography, 207, 252 (20 March 81)

R81K054. High-efficiency solid scintillation radioactivity detection for high performance liquid chromatography.

L. N. Mackey, P. A. Rodriguez* & F. B. Schroeder

The Procter and Gamble Company, Miami Valley Laboratories, P. O. Box 39175 Cincinnati, OH 45247, USA.

J. of Chromatography, 208, 1 (3 Apr. 81)

R81K055. High performance liquid chromatography of polymyxin B sulfate and colistin sulfate.

T. J. Whall

Quality Control Department, Pfizer Inc., Eastern Road, Groton, CT 06340, USA.

J. of Chromatography, 208, 118 (3 Apr. 81)

R81K056. High-performance liquid chromatographic analysis of the mycotoxin secalonic acid D and its application to biological fluids.

C. S. Reddy, R. V. Reddy, & A. W. Hayes

Department of Pharmacology and Toxicology, University of Mississippi Medical Center, Jackson, MS 39216, U.S.A.

J. of Chromatography, 208, 17 (3 Apr. 81)

K057. High performance liquid chromatographic determination of ticillamine in whole blood, plasma and urine.

F. Bergstrom, D. R. Kay & J. G. Gner*

John Center for Clinical Pharmacology
College of Pharmacy, The University
Michigan, Ann Arbor, MI 48109
(SA.)

Chromatography, 222, 445 (13 March

81K058. Immunoradiometric assay of human leucocyte interferon using monoclonal antibody.

. S. Secher

Medical Research Council Laboratory of
Molecular Biology, Hills Road, Cambri-
ge, CB 2 2QH, U K.

Nature, **290**, 501 (9 Apr. 81)

R81059. An investigation of the comparative liposolubilities of β -adrenoceptor blocking agents.

P. B. Woods & M. L. Robison

**E. R. Squibb & Sone Ltd, International
Development Laboratories Moreton,
Wirral, Merseyside, U K.**

J. of Pharmacy and Pharmacology, **33**, 872
(March 81)

R81K060. Isolation and purification of biopolymers by biospecific affinity chromatography. VII. Purification of thiamine pyrophosphokinase from brewer's yeast by affinity-adsorbent chromatography (In Russian)

I. P. Chernikevich, A. I. Voskobayev,
B. A. Kayashchitsky

Division of Metabolic Regulation,
Academy of Sciences of the Byelorussian
SSR Grodno.

Bio-organic Chemistry, **7**, 209 (Feb. 81)

R81K061. Monitoring the resolution of proteins and peptides in the course of their electrophoresis use in studying the degradative inactivation of CAMP-dependent protein kinase.

D. Alhanaty, M. Tauber Finkelstein & S. Shaltiel

Department of Chemical Immunology,
The Weizmann Institute of Science,
Rehovot, Israel.

FEBS Letters, **125**, 151 (23 March 81)

R81K062. A novel preparation of immunoabsorbents. Controlled coupling of proteins to sepharose gelatin by heterobifunctional reagent.

A. F. S. A. Habeet

Department of Biochemistry and nutrition, Medical Science Campus, University of Puerto Rico, GPO Box 5067, San Juan, P. R. 00936, USA.

Biochemica et Biophysica Acta, **673**, 527
(3 Apr. 81)

R81K063. Pharmacokinetics of cephaloridine.

Takashi Imoto

Department of Oral Surgery, Tokai University, School of medicine.

Japanese Journal of Antibiotics, **34**, 187 (Feb. 81)

R81K064. Purification of the variant antigens of *Trypanosoma congolense*. A new approach to the isolation of glycoproteins.

E. Reinwald, P. Rautenberg & H. J. Risse

Institute for Veterinar-Biochemie Freie Universitat Berlin Germany.

Biochemica et Biophysica Acta, **668**, 119 (27 March 81)

R81K065 Qualitative and quantitative analysis of some synthetic, chemically acting laxatives in urine by gas chromatography-Mass spectrometry.

R. M. Kok and D. B. Faber

Department of Clinical Pharmacy and Toxicology, Academic Hospital of the Free University of Amsterdam, De Boelelaan 1117, Amsterdam, The Netherlands.

J. of Chromatography, **222**, 389 (31 March 81)

R81K066. The quantitative spectrophotometric estimation of total sulfated glycosaminoglycan levels. Formation of soluble alcian blue complexes.

E. W. Gold

Orthopedic Research Laboratory, Ohio State University, College of Medicine Columbus OH432229, USA.

Biochemica et Biophysica Acta, **673**, 40 (3 April 81)

R81K067. Radioimmunoassay of 6-methyl-17 α -acetoxyprogesterone (MAP) in plasma of sheep during and after oral administration.

K. Sletholt

Department of Physiology, Veterinar College of Norway, P. O. Box 8146 Dep Oslol, Norway.

Acta Endocrinologica, **96**, 141 (Jan. 81)

R81K068. Rapid method for the determination of tetra alkyltin compounds in various kinds of biological material by gas chromatography.

Y. Arakawa, O. Wada, T. H. Yu and H. Iwai

Department of Hygiene and Preventive Medicine, Faculty of Medicine University of Tokyo, Tokyo, Japan.

J. of Chromatography, **207**, 237 (20 March 81)

R81K069. Relation between mixing time and segregation of ordered mixes.

J. N. Stainforth, J. E. Rees, J. B. Kayes

School of Pharmacy & Pharmacology University of Bath, Claverton Down Bath BA 27AY.

J. of Pharmacy and Pharmacology, **33**, 17 (March 81)

**R81K070. Separation of proteins on
cone coated porous glass.**

Mizutani

Faculty of Pharmaceutical Sciences,
Goya City University, Mizuhoku,
Goya 467, Japan.

J. of Chromatography, **207**, 276 (20 March
)

**R81K071. Simultaneous liquid chro-
matographic analysis of amitri-
ptyline, nortriptyline, imipramine,
desipramine, doxepin, and nordo-
xepin.**

P. M. Kabra*, N. A. Mar and L. J.
Marton

Department of Laboratory Medicine,
University of California School of Medi-
cine, San Francisco, CA 94143, USA.

Clinica Chimica Acta, **111**, 123 (9 April
81)

**R81K072. Symposium on solvent
extractions.**

M. R. Patil

Inorganic Chemistry Department, The
Institute of Science, Bombay 400 032.

J. of Scientific & Industrial Research, **40**,
110 (Feb. 81)

**R81K073. TLC on microscopic
slides: A comment.**

A. M. Bhatti & Nayb Ahmad

Indian J. of Chemical Education, **7**, 31 (Dec.
1980).

**R81K074. Treatment of slipada with
sudarsan churna and punarnavarist.**

Prem Kishore, K. V. Devidas, (Mrs) K.
Shanthakumari

Central Research Institute, Bhubaneswar.
Sachitra Ayurved, **34**, 565 (Feb. 81)

R81K075. Vitamin C and iron

A. W. Nienhuis

National heart lung and Blood Institute,
Bethesda, MD 20205.

New England Journal of Medicine, **304**, 170
(15 Jan. 81)

L NATURAL PRODUCTS

**R81L036. Anthelmintic properties
of essential oil of *Cyathocline lyrata* Cass.**

Rajendra Srivastava

Department of Pharmaceutical Sciences,
University of Saugar, Saugar (M.P.)

Science & Culture, **47**, 39 (Jan. 81)

**R81L037. Chemical constituents of
Clausena lansium: Part I-structure of
lansamide-1 & Lansine.**

Dhan Prakash, Kanwal Raj, R. S. Kapil*
& S. P. Popli.

Division of Medicinal Chemistry, Central
Drug Research Institute, Lucknow
226 001.

Indian J. of Chemistry, **19B**, 1075 (Dec.
1980)

R81L038. Chemistry and utilization of oil of jojoba (*Simmondsia chinensis* Sehneider)

V. K. Bhatia & I. E. Gulati

Indian Institute of Petroleum, Dehra Dun 248 005.

J. of Scientific & Industrial Research, **40**, 45 (Jan. 81)

R81L039. Cultivation-propagation & economics of *Rauwolfia serpentina* (Linn) benth ex-kurz.

Shri Promod Vaish

Vaish Parivar, 50 Kanwali Road, Dehra Dun 248 001.

Sachitra Ayurved, **34**, 568 (Feb. 81)

R81L040. Determination of plasma theophylline by straightphase high-performance liquid chromatography: elimination of interfering caffeine metabolites.

Ph Van Aerde, E. Moerman, R. Van Severen & P. Braeckman

Laboratory of Pharmacognosy and Galenical Pharmacy, State University of Ghent, De Pintelaan, 135, B-9000, Ghent Belgium.

J. of Chromatography, **222**, 467 (13 March 81)

R81L041. Effect of *Vinca roisa* and *Ficus racemosus* on hyperglycaemia in rats.

R. K. Ghosh & I. Gupta

Department of Pharmacology, Patna Veterinary College, Calcutta-37.

Indian J. Animal Health, **19**, 145 (Dec. 80)

R81L042. Flavonoids in biology and medicine.

V. D. Tripathi & R. P. Rastogi

Central Drug Research Institute, Lucknow-226 001.

J. of Scientific & Industrial Research, **40**, 116 (Feb. 81)

R81L043. High-performance liquid chromatographic separation of methyl glycosides.

N. W. H. Cheetham & Padmini Sirimanne

School of Chemistry, The University of New South Wales, P. O. Box Kensington, N. S. W. 2033 (Australia)

J. of Chromatography, **208**, 100 (3 April 81)

R81L044. High-performance liquid chromatography of triterpenoids.

Jiann-Tsyhlin, W. Dawid Nes & Erich Helfmann

Plant Physiology and Chemistry Research Unit, Western Regional Research Center, Science and Education Administration, U. S. Department of Agriculture, Berkeley, CA 94710, U.S.A.

J. of Chromatography, **207**, 457 (27 March 1981)

R81L045. Inclusion chromatography of alkaloids on cyclodextrin polymer beads.

Zsádon, M. Szilasi, F. Tiidos & J. Tily

"Eötvös Lorand" University of Chemical Technology, Muzeum Krt, 6—8 Budapest, 1088, Hungary.

J. of Chromatography, **208**, 109 (3 April 81)

R81L046. A New seedling blight of *Manihot khasianum* in India.

Pandey, S. N. Srivastava & S. R. Sra

Division of Plant Pathology, Indian Institute of Sugarcane Research, Lucknow 226 002.

Current Science, **50**, 141 (5 Feb. 1981)

R81L047. Phenolics from the bark of *Chloroxylon swietenia* DC Part II Isolation of swietenone coumarins G,H and I.

V. Rama Rao, K. S. Bhide & R. B. Mujumdar

National Chemical Laboratory, Poona-411 008.

Indian J. of Chemistry, **19B**, 1046 (Dec. 1981)

R81L048. Retention behavior of selected colchicine derivatives on reversed phase high-performance liquid chromatographic phase systems.

A. E. Klein & P. J. Davis*

Division of Medicinal Chemistry and Pharmacognosy, College of Pharmacy, The University of Texas at Austin, TX78712, USA.

J. of Chromatography, **207**, 247 (20 March 81)

R81L049. Studies on *Costus speciosus* (Koen) Sm: Part V Survey of natural resources in India.

Y. K. Sarin, B. K. Kapahi, S. K. Kapur, J. P. Singh & C. K. Atal

Regional Research Laboratory, Jammu 180 001.

J. of Scientific & Industrial Research, **40**, 132 (Feb. 81)

R81L050. Synthesis of two naturally occurring oxygenated oxiranes related to thymal.

Y. S. Sanghvi & A. S. Rao

National Chemical Laboratory, Poona 411 008.

Indian J. of Chemistry, **19B**, 1049 (Dec. 80)

R81M024. Allergy in laboratory animal workers.

A. Cockcroft, P. McCarthy, J. Edwards & N. Andersson

MRC Pneumoconiosis Unit, Llandough Hospital, Penarth, South Glamorgan, Wales.

Lancet, **1**, 827 (11 April 81)

R81M025. British National formulary 1981.

R. K. Knight

Gay's Hospital, London SE 19RT

Lancet, **1**, 830 (11 April 81)

R81M026. Chemical education in the seventies.

A. Kornhauser, C. N. R. Rao, D. J. Waddington & H. Zollinger

Professor of Chemistry, University of Ljubljana, Yugoslavia.

Indian J. of Chemical Education, **7**, 32 (Dec. 80)

R81M027. Ethical risks in biomedicine.

E. Marshall†

Science, **212**, 307 (17 Apr. 81)

R81M028. Fraud and the structure of science.

W. J. Broad†

Science, **212**, 137 (10 Apr. 81)

R81M029. Implications of development in genetic engineering.

Habib Haque

Division of Biochemistry, Department of Chemistry, Aligarh Muslim University, Aligarh-202 001.

J. of Scientific & Industrial Research, **40**, 51 (Jan. 81)

R81M030. Informing the public with facts and folk tales.

Editorial

New England J. of Medicine, **304**, 108 (8 Jan. 81)

R81M031. Interferon: no magic bullet against cancer.

M. Sun

Daytona Beach, Florida, Mexico

Science, **212**, 141 (10 Apr. 81)

R81M032. Inventions and inventorship issue.

R. K. Gupta & I. M. S. Manak

CSIR Patents Unit, Council of Scientific & Industrial Research, New Delhi-110 012.

J. of Scientific & Industrial Research, **40**, 1 (Jan. 81)

†Address not available.

1033. A suggestion towards
stem selection.

erial

n Chemical Engineer, 22, 1 (Oct.-Dec.

R81M034. Two aspects of scientific
responsibility.

J. T. Edsall

Department of Biochemistry and
Molecular Biology, Harvard University,
7 Divinity Avenue, Cambridge,
Massachusetts 02138.

Science, 212, 11 (3 Apr. 81)

NEW TECHNIQUES

N034. A method for tracing
chemically defined pathways in
central nervous system using
combined fluorescence retrograde
transport and immunohistochemical
techniques.

E. Sawchenko & L. W. Swanson

e Salk Institute, La Jolla, Calif 92112
SA.

ain Research, 210, 31 (6 April 81)

81N035. A new method for the
preparation of Acyl-CoA thioesters.

. Kawaguchi, T. Yoshimura, &
. Okuda

Institute of Applied Microbiology, The
University of Tokyo, Yayoi, Bunkyo-ku
Tokyo 113.

J. of Biochemistry, 89, 337 (Feb. 81)

R81N036. A simple *in vivo* methods
for evaluating drug action at central
and peripheral synapses.

P. J. Buckle & I. Spence

Roche Research Institute of Marine
Pharmacology, P. O. Box 255, Dee Why,
N. S. W. 2099, Australia.

Naunyn-Schmiedeberg's. Archives of
Pharmacology, 315, 211 (Jan. 81)

R APPLIED MICROBIOLOGY

R81R006. Isolation and charac-
terization of the first halogen
containing polyether antibiotic X-
14766A, A product of *Streptomyces*
malachitofuscus Subsp. *Downeyi*.

J. W. Westley, R. H. Evans, Jr., D. H.
Sello, N. Troupe, C. M. Liu, J. F.

Blount, R. G. Pitcher, T. H. Williams
& Philip A. Miller.

Chemical Research Department, Hoffmann
La Roche Inc. Nutley, New Jersey 07110,
U S A.

J. of Antibiotics 34, 139 (Feb 81)

R81R007. Process oxidation of ethylene glycol to oxalic acid in liquid in the presence of nitric acid.

K. Viswalingam, T. V. Subramanian and B. Jagannadhaswamy

A. C. College of Technology, Guindy, Madras 600 025.

Indian Chemical Engineer, **22**, 11 (Oct-Dec 80)

R81R008. X-14766A, A halogen containing polyether antibiotic produced by *Streptomyces malachitoides* Subsp. *Downeyi* ATCC 31547. Discovery, fermentation, biological properties and taxonomy of the producing culture.

C. M. Liu, T. E. Hermann, B. La T. Prosser, N. J. Palleroni, J. W. Westley & Philip A. Miller.

Chemical Research Department, Hoffmann La Roche Inc. Nutley, New Jersey 07110, U S A.

J. of Antibiotics, **34**, 133 (Feb 81)

FORTHCOMING MEETINGS

Conference on Advances in Fermentation
and Bioprocess Technology.

Edmonton, Alberta, Canada, 7-12 June 1981

Dr. Sanford S. Cole,
Director,
Engineering Foundation,
345, East 47th Street, New York,
N. Y. 10017, U S A.

28th IUPAC Congress.

Vancouver, British Columbia, Canada,
16-22 August 1981

Congress Secretariat,
28th IUPAC Congress,
C/o The Chemical Institute of
Canada,
151 Slater Street, Suite 906, Ottawa,
Ontario, Canada K1P 5H3.

International Symposium on Affinity
Chromatography and Related Techni-
ques.

Nijmegen, The Netherlands, 22-26 June
1981

Dr. T. C. J. Gribnau,
Organon Scientific Development
Group,
P. O. Box 20, 5340 BH Oss,
The Netherlands.

2nd International Symposium on Anaero-
bic Digestion.

Travemünde, Germany, 6-12 September 1981

Secretariat,
2nd International Symposium on
Anaerobic Digestion,
142-144 Oxford Road,
Cowley, Oxford OX4 2DZ, UK.

Continuous Culture—8th Symposium.

Oxford, UK, 25 July-1 August 1981.

Conference Secretariat,
Society of Chemical Industry,
14, Belgrave Square, London SW1X
8PS, U.K.

6th International Conference on Enzyme
Engineering.

Kashikojima, Japan, 20-25 September 1981.

Dr. Sanford S. Cole,
Director,
Engineering Foundation,
345 East 47th Street,
New York, N. Y. 10017, U. S. A.

North-American Medicinal Chemistry
Symposium,

Toronto, Canada, 20-24 June 1982

North American Medicinal Chemistry
Symposium,
C/o Ayerst Laboratories,
P. O. Box 6115,
Montreal, Que., Canada H3C 3J1.

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ENDOCRINE SYSTEM

R81A094. Additive inhibitory effects of treatment with an LHRH agonist on antiandrogen on androgen-dependent tissues in the rat.

Leguin, L. Cusan, A. Belanger, Paul A. Ray, F. Labrie & J. P. Raynaud

Department of Molecular Endocrinology, Centre Hospitalier de l'Université de Québec, Québec G1V 4G2, Canada.

Molecular & Cellular Endocrinology, **21**, 37 (1981).

R81A095. Antifertility agents:

XIV-Syntheses of 4-alkyl-6-[4-(3', 4'-trans-7'-methoxy-2', 2' dimethyl-3'-phenyl) chromanyl dihydrobenz-1, 4-oxazines, 4-alkyl-6-[4-(3, 4-trans-7'-methoxy-2', 2' dimethyl 3-phenyl) chromanyl] 1, 4-oxazines and 4-alkyl-6-[4-(7'-methoxy-2', 2' dimethyl-3'-phenyl) chromenyl] dihydrobenz 1, 4-oxazines.

K. Arora, P. L. Kole & Suprabhat Ray*

Division of Medicinal Chemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Chemistry, **20B**, 41 (Jan 81)

R81A096. Antigenic patterns of pre & post menopausal normal cervix.

S. Das, S. R. Bose & J. Roy Chowdhury

Department of Tumour Immunobiology, Chittaranjan National Cancer Research Centre, Calcutta-700 026.

Indian J. of Experimental Biology, **18**, 1368 (Dec. 80)

R81A097. Change in the response of the testis to HCG in the maturing rabbit.

M. Berger, Ch. Jean-Faucher, M. De Turckheim, G. Veyssiere & Cl. Jean

Physiologie Comparee et Endocrinologie, Université de Clermont II, Complexe Scientifique des Cezeaux, B. P. 45, 63170 France.

IRCS Medical Science, **9**, 206 (March 1981)

R81A098. Change in spermatogenic pattern with advancement of age-influence of exogenous prostaglandins.

S. Sanyal, P. B. Patna & N. M. Biswas

Department of Physiology, University of Calcutta, Calcutta-700 009.

Indian J. of Experimental Biology, **19**, 112 (Feb. 1981)

R81A099. Changes in tyrosine levels of black & white skins of guineapigs treated with psoralen & hormones.

M. Mondal & P. K. Banerjee*

Department of Physiology, University College of Medicine, Calcutta-700 009.

Indian J. of Experimental Biology, **19**, 189 (Feb 81)

R81A100. Clinical value of adrenal androgen measurement in the diagnosis of delayed puberty.

H. N. Cohen, C. H. Beastall, A. M. Wallace & J. A. Thomson

University Department of Medicine & Steroid Biochemistry, Royal Infirmary, Glasgow CAOSF.

Lancet, **1**, 689 (28 March 1981)

R81A101. Comparative kinetic studies on mouse & bovine testicular hyaluronidases.

G. S. Gupta & E. Goldberg

Department of Biophysics, Punjab University, Chandigarh-160 014.

Indian J. of Biochemistry & Biophysics, **17**, 443 (Dec. 80)

R81A102. Cytostatic & cytotoxic effects of flower extract of *Hibiscus rosa sinensis* on spermatogenically & androgenically active testes of a non-scrotal bat *Rhinopoma kinneari* Wroughton

M. S. Singwi & S. B. Lall*

Department of Zoology, University of Udaipur, Udaipur-313 001.

Indian J. of Experimental Biology, **18**, 1405 (Dec. 80)

R81A103. Daily monitoring of X-ray induced histopathological changes in spermatogenically active testes of non-scrotal bat *Rhinopoma kinneari* Wroughton.

M. S. Singwi & S. B. Lall*

Department of Zoology, University of Udaipur, Udaipur-313 001.

Indian J. of Experimental Biology, **18**, 1405 (Dec. 80)

R81A104. Early histopathological changes in testes of a non-scrotal bat *Rhinopoma kinneari* Wroughton challenged by single sub-lethal dose of cadmium chloride.

M. S. Singwi & S. B. Lall*

Department of Zoology, University of Udaipur, Udaipur-313 001.

Indian J. of Experimental Biology, **18**, 1399 (Dec. 80)

R81A105. Eclosion hormone may control all ecdyses in insects.

J. W. Truman, P. H. Taghert, P. H. Taghert, N. J. Tublitz & L. M. Schwartz

Department of Zoology, University of Washington, Seattle, Washington 98195 USA.

Nature, **291**, 70 (7 May 81)

R81A106. Effect of administration of estrogen to pregnant rabbits on the lipid content and composition of the fetal brain.

M. Tabatabai & S. A. Rooney

John B. Pierce Foundation Laboratory and Department of Physiology & Pediatric, School of Medicine, Yale University New Haven, Connecticut, USA.

IRCS Medical Science, **9**, 259 (March 81)

**107. Effect of chromatin
related factors on the activity of
and hormone receptors in rat
and brain.**

ayer, Ph., & B. Dozin-Van Roye

al Pathology Unit, Institute of
lar Pathology, University of Lou-
1200 Brussels, Belgium.

emical & Biophysical Research Communi-
s, 98, 1 (15 Jan. 81)

**A108. Effect of hippocamal
on estrus cycle and estrus
vity in rats.**

P. Thombre, V. Srinivasan, N. V.
narajana Murthy & O. P. Bhatnagar

partment of Physiology, Jawaharlal
stitute of Postgraduate Medical Educa-
and Research, Pondicerry-605 006.

ian J. of Physiology & Pharmacology, 24,
(Oct-Dec. 80)

**1A109. Effect of norephedrine
cally applied to the vas deferens on
men quality of rabbits.**

. D. Ratnasooriya, D. P. Gilmore* &
M. Wadsworth

stitute of Physiology, Glasgow Univer-
ty, Glasgow, UK.

adian J. of Experimental Biology, 19, 20
(Jan 81)

**R81A110. Effect of various uptake
inhibitor agents on the PRL-releasing
action of D-fenfluramine in male
rats.**

G. Schettini, G. F. DiRenzo, U. Aguglia,
A. Santoro & A. Quattrone

Instituto di Farmacologia, II Facolta di
Medicine e Chirurgia, Universita di
Nopoli, Italy.

IRCS Medical Science, 9, 249 (March 81)

**R81A111. The effects of extracellu-
lar sodium on acid release and
motility initiation in rat caudal
epididymal spermatozoa in vitro.**

P. Y. D. Wong, W. M. Lee & A. Y. F.
Tsang

Department of Physiology, Faculty of
Medicine, University of Hong Kong,
Honkong.

Experimental Cell Research, 131, 97 (Jan 81)

**R81A112. Effects of neonatal
administration of gonadotropins-
releasing hormone (Gn-RH) on the
testes of mice.**

R. R. Unnithan & M. Dembla

Reproductive Biology Laboratory, Depart-
ment of Zoology, University of Rajasthan,
Jaipur-302 004.

Indian J. of Experimental Biology, 19, 12
(Jan 81)

**R81A113. Elimination of pseudo-
monas from burned bone.**

A. R. Groves, J. C. Lawrence & H. A.
Lilly

M. R. C. Industrial Injuries and Burns
Unit, Birmingham Accident Hospital,
Birmingham-B15INA.

Lancet, 1, 676 (21 March 81)

R81A114. β -Endorphin: primary structure of the hormone from the ostrich pituitary gland.

R. J. Naude, D. Chung, C. H. Li & S. Oelofsen

Hormone Research Laboratory, University of California San Francisco, C A94143.

Biochemical & Biophysical Research Communication, **98**, 108 (15 Jan 81)

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R. Puri & S. K. Ray

Department of Endocrinology, Central Drug Research Institute, Lucknow-226 002,

Indian J. of Experimental Biology, **19**, 26 (Jan 81)

R81A116. Guanine nucleotides modulate TRH-receptor binding in sheep anterior pituitary.

Richard L. Taylor & D. R. Burt

Department of Pharmacology & Experimental Therapeutics, University of Maryland School of Medicine, Baltimore, MD 21201, USA.

Molecular & Cellular Endocrinology, **21**, 85 (Jan 81)

R81A117. Heterocyclic prostaglandin analogues. Part 3. The relationship of configuration to biological activity for some hydantoin prostaglandin analogues.

M. A. Brockwell, A. G. Caldwell, N. Whittaker* & M. J. Begley

The Wellcome Research Laboratories, Beckenham, Kent BR33BS.

J. of the Chemical Society: Perkin Transactions-I, No 3, 706 (1981)

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S. K. Taneja & Nirmal

Department of Zoology, Panjab University, Chandigarh-160 014.

Indian J. of Experimental Biology, **18**, 14 (Dec. 80)

R81A119. Hormonal control of uteroglobin secretion and preuteroglobin mRNA content in rabbit endometrium.

B. Heins & M. Beato

Institute fur Physiologische Chemie Philipps, Universitat, Marburg (GER)

Molecular and Cellular Endocrinology, **2**, 139 (Feb. 1981)

R81A120. Hormonal influences on the oviducal lactate dehydrogenase and its isoenzymes.

G. Vanithakumari, P. Govindarajulu & N. Srinivasan

Department of Endocrinology, P. G. Institute of Basic Medical Sciences, University of Madras, Taramani, Madras-600 042.

Indian J. of Physiology & Pharmacology, **2**, 335 (Oct-Dec. 80)

R81A121. Hormonal regulation of plasma estrogen and progesterone receptors in the beagle uterus oviduct.

Lessey, R. Wahawisan & T.A. Gorell*

Department of Zoology and Entomology,
Colorado State University, Fort Collins,
80523, USA.

Molecular and Cellular Endocrinology, **21**, 171
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R81A122. Influence of sex steroids on prolactin on rat-mammary gland.

Srinivasan, P. Govindarajulu & G. Sathakumari

Department of Endocrinology, P. G.
Institute of Basic Medical Sciences,
University of Madras, Taramani, Madras-
600042.

Indian J. Physiology & Pharmacology, **24**,
(Oct-Dec. 80)

R81A123. Inhibitory effect of gonadotropin releasing hormone on cultured testicular cells.

J. W. Hsueh, J. R. Schreiber & G. F. Jackson

Department of Reproductive Medicine,
University of California, San Diego, La
Jolla, CA 92093, USA.

Molecular and Cellular Endocrinology, **21**, 43
(Jan 81)

R81A124. Interrelation between estradiol, TRH, porphenazine and bromocriptine on prolactin release in the rat.

E. Goldhaber, J. Shani*, S. Avisar &
S. Zukerman

Department of Pharmacology, School of
Pharmacy, The Hebrew University of
Jerusalem, Israel.

IRCS Medical Science, **9**, 235 (March 1981)

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M. D. Mitchell, S. M. Sellers, M.
Menchini, A. Aynsley Green & A. C.
Turnbull

Nuffield Dept. of Obstetrics & Gynaeco-
logy & Dept. of Paediatrics, University
of Oxford, John Radcliffe Hospital,
Headington, Oxford OX 3 9DU, Britain.

IRCS Medical Science, **6**, 222 (March 81)

R81A126. Legendary chemical aphrodisiacs

Thomas G. Waddell, Hal Jones & A. L.
Keith

University of Tennessee at Chattanooga,
TN 37402, USA.

Indian J. of Pharmaceutical Sciences, **43**, 1
(Jan-Feb 81)

R81A127. Mode of entry of steroid and thyroid hormones into cells.

Govind S. Rao

Institut für Klinische Biochemie der
Universität, Bonn, Sigmund-freud-strasse
25, 5300 Bonn 1, FRG.

Molecular & Cellular Endocrinology, **21**, 97
(Feb. 81)

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F. F. G. Rommerts and A. O. Brinkman

Department of Biochemistry, Division of Chemical Endocrinology, Medical Faculty, Erasmus University, Rotterdam, The Netherlands.

Molecular & Cellular Endocrinology, **21**, 15 (Jan. 81)

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J. Ford & M. Deluca

Department of Chemistry, University of California, La Jolla, California 92093.

Analytical Biochemistry, **110**, 43 (1 Jan. 1981)

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A. Nimrod

Department of Hormone Research, The Weizmann Institute of Science, Rebovot, Israel.

Molecular & Cellular Endocrinology, **21**, 51 (Jan. 81)

R81A131. The organ culture of human epididymal tubules and their response to androgens.

Jorge G. Tenzon & Jorge A. Blaquier

Institute de Biología y Medicina Experimental Obligado 2490, Buenos Aires (1428), Argentina.

Molecular & Cellular Endocrinology, **21**, 1 (March 1981)

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J. S. Upadhyaya & P. K. Srivastava

Department of Chemistry, University of Roorkee, Roorkee-247 672.

Indian J. of Pharmaceutical Sciences, **43**, 1 (Jan-Feb. 81)

R81A133. Plasma levels of estradiol and progesterone during normal menstrual cycle in langur (*Presbytis entellus*).

S. R. Chowdhury, R. K. Saran & Chandra

Division of Endocrinology, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Physiology & Pharmacology, **364** (Oct-Dec. 80)

R81A134. Pregnancies in humans achieved by fertilization in vitro and embryo transfer in the controlled ovulation cycle.

A. O. Trounson, J. F. Leeton, C. Webb & J. Wood

Department of Obstetrics & Gynaecology, Monash University, St. Andrews Hospital, Melbourne, Australia 3000.

Science, **212**, 681 (8 May 1981)

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J. Beinfeld & Paul C. Packman

Laboratory of Clinical Science, National Institute of Mental Health, Bethesda, Maryland 20205.

Biochemical & Biophysical Research Communications, **98**, 197 (15 Jan. 81)

R81A136. Progestins inhibit fish-mimetic stimulated granulosa estrogen production at a post-cAMP site.

J. Schreiber, K. Nakamura & G. F. McKenney

Department of Reproductive Medicine, University of California, San Diego, La Jolla, CA 92093, USA.

Molecular & Cellular Endocrinology, **21**, 161 (Feb. 81)

R81A137. Prolactin inhibits oestrogen synthesis in the ovary.

J. Dorrington & R. E. Gore-Langton

Planting & Best Department of Medical Research, University of Toronto, Toronto Ontario, Canada M5G 1L6.

Nature, **290**, 600 (16 Apr. 81)

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K. Kunikazy Sakai, Takeo Kobori & T. Fujisawa

Chemistry Department of Resources, Mie University, TSU, Mie 514, Japan.

Tetrahedron Letters, **22**, 115 (1981)

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T. Hazatao & A. Murayama

Department of Immunology, The Tokyo Metropolitan Institute of Medical Science, Honkyomegane, Bunkyo-ku, Tokyo 113, Japan.

Biochemical & Biophysical Research Communications, **98**, 488 (30 Jan. 81)

R81A140. Radioimmunoassay for urinary prostaglandins E & F: normal values in different age groups.

D. Benzoni, M. Vincent & J. Sassard

Department de Physiologie et de Pharmacologie, Faculte de Pharmacie, Grange-Blanche, 8 Avenue Rockefeller, Lyon, France.

Clinica Chimica Acta, **III**, 9 (19 March 81)

R81A141. Regioselective mercuriation of an estradiol derivative: A facile entry to 2-substituted estrogens.

E. Santaniello & P. Ferraboschi

Istituto di Chimia, Facolta di Medicina, Universita di Milano, Via Saldini, 50 I-20133 Milano, Italy.

J. C. S. Chemical Communications, **5**, 217 (1981)

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S. Jayaraman, K. S. Hurkadll, S. B. Moodbedri & A. R. Sheth

Institute for Research in Reproduction (ICMR), Parel, Bombay-400012.

Indian J. of Experimental Biology, **19**, 80 (Jan. 81)

R81A143. Reversible chemical sterilization: effects of cyclohexanol administration on the testes and epididymides of male rabbit.

V. P. Dixit, R. S. Gupta, S. Kumar & B. C. Joshi

Department of Zoology and Chemistry, University of Rajasthan, Jaipur-302 004.

Indian J. of Physiology & Pharmacology, **24**, 278 (Oct-Dec. 80)

R81A144. Role of HY antigen in gonadal differentiation.

C. S. Rao, R. A. Vaedya, Z. M. Patel & L. M. Ambari

Unit of Medical Genetics, Institute for Research in Reproduction, Jehangir Merwanji Street, Parel, Bombay-400 012.

Indian J. of Medical Research, **73**, 342 (March 81)

R81A145. Role of intra-amniotic instillation of betamethasone in prolonged pregnancy.

N. Agarwal, T. Mathur, N. Gupta, V. Sharma & R. K. Agarwal*

39 Ravindra Nagar, Udaipur-313 101

Indian J. of Medical Research, **73**, (March 81)

R81A146. Short & long term effect of aspirin on testes of albino rat: histological & biochemical study.

A. Balasubramanian, S. Manimeka A. G. Singh & S. Ramakrishnan

Jawaharlal Institute of Postgraduate Medical Education and Research, Pondicherry-605 006.

Indian J. of Experimental Biology, **18**, 1 (Dec. 80)

R81A147. Sperm abnormalities and cigarette smoking.

H. J. Evans, J. Fletcher, M. Torrance T. B. Hargreave.

MRC Clinical and Population Cytogenetics Unit, Western General Hospital, Edinburgh EH 42X4.

Lancet, **1**, 627 (21 March 81)

R81A148. Steroid and plasminogen activator production by cultured granulosa cells in response to hormone treatment.

W. K. Liu, B. Daniel Burleigh & D. N. Ward

The University of Texas System Cancer Centre, M. D. Anderson Hospital and Tumor Institute, Department of Biochemistry, 6723 Bertner Avenue, Houston TX 7703, USA.

Molecular & Cellular Endocrinology, **21**, (Jan. 81)

**149. Studies on usage of mouse
n instead of gonadotropin-free
an serum in luteinizing hormone
immunoassay.**

ashimoto

ral Clinical Laboratory, Kanazami
ersity Hospital, 13-1 Takaramachi,
azawa, 920, Japan.

Chimica Acta, **III**, 105 (19 March

A150. 18-Substituted steroids.

**8. An improved synthesis of 11 β -
1-Trihydroxypregn-4-ene-3. 20-dions
'Hydroxycorticosterone').**

N. Kirk & C. J. Slade

ical Research Council Steroid Refer-
e, Chemistry Department, Westfield
ege, Hampstead London N. W.

f the Chemical Society Perkin Transactions-
703 (1981)

**A151. Successful outcome of
pregnancy in women with hypothyroi-
m.**

Montoro, J. V. Colleas, S. Douglas
nsier & J. H. Mestman

0 North Mission Road, Room 5K22,
s Angeles, CA 9033.

als of Internal Medicine, **94**, 31 (Jan. 81)

**A152. Synthesis and some
armacological properties of
- β -Ala] oxypressin (1).**

Anagnostaras, P. Cordopates &
Theodoropoulou*

Laboratory of Organic Chemistry,
University of Patras, Greece.

European J. of Medicinal Chemistry, **16**, 171
(March-April 81)

**R81A153. Synthesis of androgen-
dependent secretory proteins by rat
seminal vesicles.**

S. J. Higgins, A. Colman, F. M. Fuller
& P. J. Jakson

Department of Biochemistry, University
of Leeds LS29LS, Great Britain.

Molecular & Cellular Endocrinology, **21**, 255
(March 81)

**R81A154. Uterine proteins influenced
by estrogen exposure. Analysis by
two-dimensional gel electrophoresis**

K. S. Korach, S. E. Harris & D. B. Carter

Laboratory of Reproductive and Develop-
mental Toxicology, National Institute of
Environmental Health Sciences, P. O.
Box 12233, Research Triangle Park, NC
27709, USA.

Molecular & Cellular Endocrinology, **21**, 243
(March 81)

**R81A155. Vitamin D and plasma
magnesium in pregnancy.**

I. R. F. Brown, O. G. Brooke & D. J.
Haswell

Departments of Chemical Pathology and
Child Health, St. Georgia Hospital
Medical School, Cranmer Terrace,
London SW17 ORE, U K.

Clinica Chimica Acta, **III**, 109
(19 March 81)

B NERVOUS SYSTEM

R81B099. Acceleration of β -receptor desensitization in combined administration of antidepressants and phenoxybenzamine.

F. T. Crews, S. M. Paul & F. K. Goodwin

Department of Pharmacology & Therapeutics, University of Florida, Gainesville, Florida, 32610, USA.

Nature, **290**, 787 (30 April 81)

R81B100. Action of certain anaesthetic agents on erythrocyte calcium permeability.

P. Dube & Prem Sagar*

Division of Biophysics, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 143 (Feb. 81)

R81B101. Adrogenic influences on the mesolimbic dopaminergic system in the rat.

C. J. Earley & B. E. Leonard

Pharmacology department, University College, Galway, Republic of Ireland.

IRCS Medical Science, **9**, 260, (March 81)

R81B102. α -(Arylcarboxamido)- γ -butyrolactones as potential strychnine antagonists.

J. K. Chakrabarti, C. H. Cashin and S. Sutton

Lilly Research Centre Limited, Windsham, Surrey, GU20 6PH England.

European J. of Medicinal Chemistry, **16**, 1 (March-April 81)

R81B103. Biochemical composition of brain in young rhesus monkey with protein calorie malnutrition.

S. Mehta, N. K. Relan & C. K. Nain

Department of Pediatrics, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Experimental Biology, **19**, 2 (March 81)

R81B104. Convulsant and anticonvulsant barbiturates 2. Molecular orbital calculations.

P. R. Andrews and G. P. Jones

Victorian College of Pharmacy Ltd, 38 Royal Parade Parkville, Melbourne Victoria, 3052 Australia.

European J. of Medicinal Chemistry, **16**, 1 (March-April 81)

R81B105. Convulsant and anticonvulsant barbiturates 3. Conformational analysis by ^1H and ^{13}C NMR.

P. R. Andrews, A. J. Jones, G. P. Jones, A. Marker and E. A. Owen

Victorian College of Pharmacy Ltd., 38 Royal Parade Parkville, Melbourne Victoria, 3052, Australia.

European J. of Medicinal Chemistry, **16**, 1 (March-April 81)

**B106. Drug discrimination learn-
in lead-exposed rats.**

Zenick & M. Goldsmith

Department of Environmental Health,
Testing Laboratory, University of
Cincinnati, Cincinnati, Ohio 45267,
A.

Science, **212**, 569 (1 May 81)

**B107. Drug interactions between
clonidine & some centrally acting
agents.**

Sethi, V. K. Mohan Rao & C. R.
Sadas

Department of Biochemistry, Central
Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 241
(March 81)

**B108. Drug therapy: Spasticity
(first of two parts).**

Robert R. Young & P. J. Delwaide

Clinical Neurophysiology Laboratory,
Massachusetts General Hospital, Boston,
MA 02114.

New England J. of Medicine, **304**, 28
(Jan. 81)

**B109. Effects of wheat and bengal
gram diets on glutamic acid meta-
bolism in rat brain.**

K. N. Agarwal and C. Prasad

Department of Paediatrics, Institute of
Medical Sciences, Banaras Hindu Univer-
sity, Varanasi-221 005.

Indian J. of Medical Research, **73**, 350
(March 81)

**R81B110. Effects of enkephalins
infusion on hormonal levels in man:
Inhibitions of the episodic secretion
of LHBY Met -enkephalin.**

J. Golstein, F. Cantraine, G. Copinschi,
M. L. Hermite, D. Pipelccrs, C. Robyn,
B. Velkeniers & L. Vanhaelst

Laboratory of Interdisciplinary Research
(IRIBHN) (ULB), Laboratory of Experi-
mental Medicine (ULB), Deptt. of
Gynaecology, St. Pierre Hospital (ULB),
Deptt. of Metabolism & Endocrinology
(VUB), University of Brussels, Belgium.

IRCS Medical Science, **9**, 218 (March 81)

**R81B111. How β_2 -selective is the
adrenoceptor antagonist-drug, IPS 3392.**

S. R. O'donnell* and K. Walduck

Pharmacology Section, Dept. Physiology
& Pharmacology, University of Queens-
land, Brisbane 4067, Australia.

J. Pharmacy & Pharmacology, **33**, 223
(April 81)

**R81B112. Identification and quanti-
fication of 1,2,3,4-tetrahydro β -car-
boline, 2-methyl-1, 2, 3, 4-tetrahydro-
 β -carboline, and 6-methoxy-1, 2, 3, 4-
tetrahydro β -carboline as *in vivo* cons-
tituents of rat brain and adrenal
gland.**

S. A. Barber, R. E. W. Harrison, J. A.
Monti, G. B. Brown & Samuel T. Christian

The Neurosciences Program of the
Department of Psychiatry, The University
of Alabama in Birmingham, Birmingham,
AL 35294, USA.

Biochemical Pharmacology, **30**, 9 (1 Jan. 81)

R81B113. Identification of rat brain specific soluble protein antigens.

A. K. Ahuja & D. Subrahmanyam

Defence Institute of Physiology & Allied Sciences, Delhi Cantonment-110 010.

Indian J. of Biochemistry & Biophysics, **17**, 479 (Dec. 80)

R81B114. Influence du "vecteur" sucre sur l'activite antalgique: glycosides d'analgésiques usuels.

G. Boschi, M. Desiles, A. L'h elgoualc'H et Richard Rips*

Unitede Pharmacologie Chimique de l'INSERM 17 rue du Fer Moulin 75005 Paris, France.

European J. of Medicinal Chemistry, **16**, 125 (March-April 81)

R81B115. Influence of an Indian medicine (Ashwagandha) on acute-phase reactions in inflammation.

K. Anbalagan & J. Sadique*

Department of Biochemistry, School of Biological Sciences, Madurai Kamaraj University, Madurai-625 021

Indian J. of Experimental Biology, **19**, 245 (March 81)

R81B116. Inhibitory effect of adrenaline on rat paw oedema induced by mercury.

R. J. Jha & V. V. Kelkar*

Department of Pharmacology, Government Medical College, Surat-395 001.

Indian J. of Experimental Biology, **18**, 1496 (Dec. 80)

R81B117. In vitro methylation of chromosomal proteins of the brain of rats of various ages & its modulation by epinephrine.

R. Das & M. S. Kanungo

Biochemistry Laboratory, Department of Zoology, Banaras Hindu University, Varanasi-221 005.

Indian J. of Biochemistry & Biophysics, **17**, 429 (Dec. 80)

R81B118. Lowering of dopamine metabolites in rat brain by harmaline.

R. W. Fuller, S. K. Hemrick-Lueck & K. W. Perry

The Lilly Research Laboratories, Lilly and Company, Indianapolis, Indiana 46285, USA.

J. of Pharmacology & Pharmacology, **17**, 255 (April 81)

R81B119. Neurotensin blocks certain amphetamine-induced behaviours.

G. N. Ervin, L. S. Birkemo, C. B. Nemeroff & A. J. Prange Jr.

Biological Sciences Research Center, University of North Carolina, School of Medicine, Chapel Hill, N. Carolina 27514, USA.

Nature, **291**, 73 (7 May 81)

R81B120. Possible neurochemical action of the benzodiazepines.

V. Iyengar & B. S. Doshi

Department of Biochemistry, Government Medical College and J. J. Hospital, Bombay

Indian Drugs, **18**, 161 (Feb. 81)

B121. Preparation of tritium labeled B-endorphin suitable for studying brain receptor interactions.

G. Hammonds, Jr., Nicholas Ling & David Puett*

Department of Biochemistry, Vanderbilt University, Nashville, TN 37232.

Chemical and Biophysical Research Communication, **98**, 211 (15 Jan. 81)

B122. Relationship between anticonvulsant activity and enzyme inhibitory effectiveness of substituted diazoles.

J. Chaudhary, S. K. Chaudhary, S. S. Parmar*, A. K. Chaturvedi and N. G. S. Rao

University of North Dakota, Grand Forks, North Dakota 58202

European J. of Medicinal Chemistry, **16**, 105 (March-April 81)

B123. Role of cyclic AMP in a serotonin-evoked slow inward current in snail neurons.

J. Deterre, D. P. Tritsch, J. Bockaert & L. M. Gerchenfeld

Laboratory de Neurobiologie, Ecole Normale Supérieure, 46 Rue D'Ulm, 75230 Paris Cedex 05, France.

Nature, **290**, 783 (30 Apr. 81)

B124. Search for newer analgesic agents: Pt. I. Synthesis of 1-arylamino-cyclohexane-1-carboxamide derivatives.

G. B. Singh, A. Jetley & H.G.S. Rathore*

Department of Pharmacology, Kakatiya University, Warangal-506 009.

Indian J. of Chemistry, **20B**, 76 (Jan. 81)

R81B125. "Self-awareness" in the pigeon.

R. Epstein, R. P. Lanza & B. F. Skinner

Department of Psychology & Social Relations, Harvard University, Cambridge, Massachusetts 02138, USA.

Science, **212**, 695 (8 May 81)

R81B126. Sertoli-Leydig cell communication via an LHRH-like factor.

R. M. Sharpe, H. M. Fraser, I. Cooper & F. F. G. Rommerts

M R C Reproductive Biology Unit, Centre for Reproductive Biology, 37 Chalmers Street, Edinburgh EH 3 9 EW, UK.

Nature, **290**, 785 (30 Apr. 81)

R81B127. Sex differences in the effects of unilateral brain damage on intelligence.

J. Inglis & J. S. Lawson

Department of Psychology, Queen's University, Kingston, Ontario K7L 3N 6, Canada.

Science, **212**, 693 (8 May 81)

R81B128. A simple device for rapid measurement of rat paw oedema for evaluation of anti-inflammatory activity.

A. Roy, S. M. Roy, J. K. Gupta & S. C. Lahuri

Department of Pharmacy, Jadavpur University, Calcutta-700 032.

Indian J. Physiology & Pharmacology, **24**, 369 (Oct.-Dec. 80)

R81B129. Some observations on tryptaminetetrazolium reductase activity of rat brains.

C. Mitra & S. R. Guha

Indian Institute of Experimental Medicine, Calcutta-700 032

Indian J. Biochemistry & Biophysics, **17**, 448 (Dec. 1980)

R81B130. Stress-induced analgesia in humans: endogenous opioids and naloxone-reversible depression pain reflexes.

J. C. Willer, M. Dehen & J. Cambier

Laboratoire de Physiologie, Faculte de Medecine Saint-Antoine, 27rue Chaligny, F 75571 Paris Cedex 12, France.

Science, **212**, 689 (8 May 81)

R81B131. Studies in experimental meningoencephalitis: Changes in amino acid levels & their metabolism in mouse brain.

U. S. Singh & V. K. Mohan Rao

Division of Biochemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 1 (Feb. 81)

R81B132. Studies on anti-inflammatory, analgesic and antipyretic activities of some Indian acids.

A. Roy, J. K. Gupta and S. C. Lahiri

Department of Pharmacy, Jadavpur University, Calcutta-700 032.

Indian J. of Physiology & Pharmacology, **24**, 310 (Oct.-Dec. 80)

R81B133. Systemically administered prolyl-leucyl-glycinamide fails to alter dopaminergic neuronal activity in the rat brain.

R. H. Alper, K. E. Moore

Department of Pharmacology and Toxicology, Michigan State University, East Lansing, Michigan 48824, USA.

J. of Pharmacology, **33**, 259 (April 81)

R81B134. Withdrawal syndrome after continuous infusion of clonidine in the normotensive rat.

M. J. M. C. Thoolen, P. B. M. W. M. Timmermaus and P. A. Van Zwiften.

Laboratorium Voor Farmacie, Universiteit van Amsterdam, Plantage Muidergracht 24, 1018 TV Amsterdam, The Netherlands.

J. of Pharmacy & Pharmacology, **33**, 235 (April 81)

CARDIOVASCULAR SYSTEM

R81C103. Calcium & calcium antagonists: their role in heart diseases.

L. Verma and L. N. Iyengar

Department of Pharmacology, L. M. College of Pharmacy, Ahmedabad-380 009, India.

Indian J. of Hospital Pharmacy, **17**, 146 (Nov.-Dec. 80)

R81C104. "Calcium influx blockers" and vascular smooth muscle: do we really understand the mechanism?

Editorial

Robert Zelis & S. F. Flaim

Division of Cardiology, Dept. of Medicine, The Milton S. Hershey Medical Centre, The Pennsylvania State University College of Medicine, Hershey, Pennsylvania.

Annals of Internal Medicine, **94**, 124 (Jan 81)

R81C105. Cardioregulatory properties of indoramin in the rat.

M. R. Algate, S. Rashid and J. F. Waterfall*

Department of Pharmacology, Wyeth Institute of Medical Research, Huntercombe Lane South, Taplow, Maidenhead, Berkshire, U K.

J. of Pharmacy & Pharmacology, **33**, 236 (April 81)

R81C106. Culture of cardiac muscle cells in serum-free media.

W. C. Claycomb

Department of Biochemistry, Louisiana State University School of Medicine, New Orleans, LA 70112, USA.

Experimental Cell Research, **131**, 231 (Jan 81)

R81C107. Effect of glucagon on arrhythmias induced by coronary artery occlusion and ouabain in dogs.

J. Singh, S. Dala, A.H. Kaur & K.N. Garg

Department of Pharmacology, Medical College, Rohtak-124 001.

Indian J. of Physiology & Pharmacology, **24**, 329 (Oct-Dec. 80)

R81C108. Effect of isoprenaline on ether induced arrhythmias.

A. K. Kela, L. Prakasam Reddy, D. P. Thombre and U. C. Rai

Department of Pharmacology & Physiology, J I P M E R, Pondicherry-605 006.

Indian J. of Physiology & Pharmacology, **24**, 367 (Oct.-Dec. 80)

R81C109. A hypertensive response to baclofen in the nucleus tractus solitarius in rats.

P. Persson

Department of Pharmacology, University of Goteborg, Box 33031, S-4033 Goteborg, Sweden.

J. of Pharmacy & Pharmacology, **33**, 226 (April 81)

R81C110. Lactate dehydrogenase isozymes: effect of isoproterenol induced myocardial ischaemia.

P. K. Ganguly, L. M. Srivastava, P. S. Bora & M. P. Gupta

Department of Biochemistry & Pharmacology, All India Institute of Medical Sciences, New Delhi-110029.

Indian J. of Experimental Biology, **18**, 1443 (Dec 80)

R81C111. Response of human ventricular heart muscle to histamine.

R. W. Gristwood, D. A. A. Owen, L. Eckel, P. Satter & H. Nawrath*

Pharmakologisches Institut der Universität Mainz, D-6500 Mainz, Federal Republic of Germany.

J. of Pharmacy & Pharmacology, **33**, 2 (April 81)

R81C112. Tyrosine increases blood pressure in hypotensive rats.

L. A. Corlay, T. J. Maher & R. Wurtman

Laboratory of Neuroendocrine Regulation, Department of Nutrition & Food Science, Massachusetts Institute of Technology, Cambridge 02139, USA.

Science, **212**, 559 (1 May 81)

E GASTROINTESTINAL DISORDERS

R81E032. Cimetidine.

V. R. Gudsoorkar

Sarabhai Research Centre, Baroda

Indian J. of Hospital Pharmacy, **17**, 165 (Nov.-Dec. 80)

R81E033. Giant benign gastric ulcer.

S. P. Kaushik

Department of Surgery, Postgraduate Institute of Medical Education and Research, Chandigarh-160 012.

Indian J. of Medical Sciences, **34**, 241 (Oct. 81)

R81E034. Inhibition of glucose transport in the rats small intestine by cellulose phlorizin.

T. Kasagi, N. Kawaguchi & Y. Hiji

Department of Nursing, Tottore University, College of Medical Care Technology, Yonago 683, Japan.

IRCS Medical Science, **9**, 250 (Mar. 81)

R81E035. Interaction of vasoactive intestinal peptide with human blood mononuclear cells.

J. M. Guerrero, J. C. Prieto, F. L. Elorza, R. Ramirez and R. Goberna

Department of Biochemistry, School of Medicine, University of Sevilla, Sevilla, Spain.

Molecular & Cellular Endocrinology, **21**, 15 (Feb. 81)

E036. On the pharmacological actions of a diuretic fenquizone, with particular reference to its site of action.

Ferrando, J. M. Foy*, C. N. F. W. et & J. R. Purvis

School of Studies in Pharmacology, University of Bradford, Bradford, BD 71 1 U K.

J. of Pharmacy & Pharmacology, **33**, 219 (April 81)

E037. Preparation of aluminium-magnesium complexes of aliphatic hydroxy and thio acids—as antacids.

Singh (Mrs.), A. Kar and B. J. Joridele

School of Pharmaceutical Sciences, University of Nigeria, Nsukka, Nigeria.

Indian J. of Pharmaceutical Sciences, **43**, 12 (Jan.-Feb. 81)

R81E038. Properties of Ca^{2+} uptake and release by golgi membrane vesicles from rat intestine.

R. A. Freedman, J. A. MacLaughlin & M. M. Weiser*

Division of Gastroenterology and Nutrition, State University of New York at Buffalo, Clinical Center Annex, CC186, 462 Grider st Buffalo, N. Y. 14215.

Archives of Biochemistry & Biophysics, **206**, 233 (Feb. 81)

R81E039. The role of intestinal clostridia and the effect of asafoetida (Hing) and alcohol in flatulence.

S. K. Garg, A. C. Banerjee and J. Verma

Dairy Microbiology Division, National Dairy Research Institute, Karnal-132 001, India.

Indian J. of Microbiology, **20**, 194 (July-Sep. 81)

METABOLIC AND DEGENERATIVE DISORDERS

R81F105. Acid phosphatase activity as an index of pancreatic beta-cell function.

K. Chatterjee & S. K. Mukerjee

Division of Toxicology & Experimental Medicine, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 228 (March 81)

R81F106. Action pattern of human pancreatic α amylase on maltoheptaose, a substrate for determining α -amylase in serum.

E. O. Haegle*, E. Schaich, E. Rauscher, P. Lehmann & M. Grasse

Boehringer Mannheim GmbH, Biochemica Werk Tutzing, D. 8132, Tutzing/Obb (GRF).

J. of Chromatography (Biomedical Applications), **223**, 69 (10 April, 81).

R81F107. Bacitracin: an inhibitor of the insulin degrading activity of glutathione insulin transhydrogenase.

Richard A. Roth

Cell Biology Research Laboratory and Department of Medicine, Mount Zion Hospital and Medical Centre, San Francisco, C. A. 94120.

Biochemical and Biophysical Research Communications, **98**, 431 (30 Jan. 81)

R81F108. Cell-substratum and cell-monolayer adhesion are dependent upon cellular cholesterol biosynthesis.

W. K. Cavenee, H. W. Chen and A. A. Kandutsch

Massachusetts Institute of Technology, E17-221 Cambridge, MA 02139, USA.

Experimental Cell Research, **131**, 31 (Jan. 81)

R81F109. Changes in cellular constituents of gastrointestinal tract in hyperglycaemic & hyperlipaemic states of rabbits.

I. Sunitha & K. Radha Shanmugasundaram

Department of Biochemistry, Post-Graduate Institute of Basic Medical Sciences, University of Madras, Madras-600 402

Indian J. of Experimental Biology, **18**, 1451 (Dec. 80)

R81F110. Chronic effects of drugs on liver histology & serum aminotransferases in rabbits maintained on high fat diet.

S. D. Belare

School of Biological Sciences, Bhopal University, Bhopal-462 026.

Indian J. of Experimental Biology, **19**, 1 (Feb. 80)

R81F111. Comparison of the accommodation index with other electrodiagnostic tests in the screening of neuromuscular damage in diabetic patients.

B. C. Norris, J. B. Concha, G. S. Verdugo & J. Donoso

Dept. of Physiology and Endocrinology, University of Concepcion, Concepcion, Chile.

IRCS Medical Sciences, **9**, 274 (March 81)

R81F112. Comparison of the effects of sodium salicylate with anti-ulcer agents in preventing indomethacin induced intestinal ulcer.

E. Ezer, L. Szporny

Pharmacological Laboratory, Chemical Works of G. Richter Ltd. H-14 Budapest, Hungary.

J. of Pharmacy & Pharmacology, **33**, 2 (Apr. 81)

R81F113. Contrasting effects of various sulfhydryl reagents on the activity of lecithin: Cholesterol acyltransferase.

Roy B. Verdery

Institut de Recherches Cliniques de
Montreal, Laboratoire de Metabolisme
des lipoproteines, 110, ouest, Avenue des
Montreal H2W 1R7, Quebec,
Canada.

*Biochemical & Biophysical Research Communi-
cations*, **98**, 494 (30 Jan. 81)

**R81F114. A coordinated approach to
children's health in India. Integrated
child development service.**

J. N. Tandon

Department of Gastroenterology and
Human Nutrition, All India Institute of
Medical Sciences, Ansari Nagar, New
Delhi-110 029, India.

Lancet, **1**, 650 (21 March 81)

**R81F115. Decreased bioassayable
somatomedin activity following
insulin administration in vivo.**

G. S. G. Spencer

A. R. C. Meat Research Institute,
Dangford, Bristol BS18 7DY, England.

IRCS Medical Sciences, **9**, 213 (March 81)

**R81F116. Effect of dietary lipids on
composition and glucose utilization
by rat adipose tissue.**

A. B. Awad

Department of Biochemistry, Kirksville
College of Osteopathic Medicine,
Kirksville, MO 63501.

J. of Nutrition, **111**, 34 (Jan. 81)

**R81F117. Effects of hypophysectomy
and corticosterone acetate treatment
on hepatic lipid composition in the
chick (*Gallus domesticus*) embryo.**

Byron A. Doneen

Division of Biological Sciences, University
of Michigan, Ann Arbor, Michigan 48109.

General & Comparative Endocrinology, **43**, 284
(March 81)

**R81F118. Effect of malathion on
nucleotide deamination in sheep liver.**

W. Rajendra, D. Bhargava, K. Indra &
K. S. Swami

Department of Zoology, Sri Venkateswara
University, Tirupati-517 502.

National Academy Science Letters, **3**, -277
(Sept. 80)

**R81F119. The effect of pH on
⁸⁶rubidium efflux from pancreatic
islet cells.**

J. C. Henquin

Unite de Diabete et Croissance, Univer-
sity of Louvain School of Medicine, UCL
54 74, 1200 Brussesl, Belgium.

Molecular & Cellular Endocrinology, **21**, 119
(Feb. 81)

**R81F120. Effect of pregnancy on the
uptake of lipo-protein triglyceride fatty
acids by isolated adipocytes in the rat.**

M. A. Lasuncion & E. Herrera

Catedra de Fisiologia General, Facultad
de Biologia, Universidad de Barcelona,
and Departamento de Investigacion, Centro
"Romon Y Cajal" Madrid 34, Spain.

*Biochemical & Biophysical Research Communi-
cation*, **98**, 277 (15 Jan. 81)

R81F121. Effect of prolactin and prostaglandins on the stimulation of prolactin binding sites in the male rat liver.

R. J. Barkey, J. Shani, M. Lahav, T. Amit & M. B. H. Youdim

Department of Pharmacology, Faculty of Medicine, Technion-Israel Institute of Technology, POB 9649, Haifa, Israel.

Molecular & Cellular Endocrinology, **21**, 129 (Feb. 81)

R81F122. Effect of quinolinic acid on the metabolite profile and regulation of carbohydrate and lipid metabolism in the liver of diabetic rats.

K. A. Gumaa, M. Sochor, P. Mclean & A. L. Greenbaum

Department of Biochemistry, Faculty of Medicine, Kuwait University, Kuwait,

Archives of Biochemistry & Biophysics, **206**, 1 (June 81)

R81F123. Effects of thiazide diuretics on plasma lipids and lipoproteins in mildly hypertensive patients: A double blind controlled trial.

R. H. Grimm Jr., A. S. Leon, D. B. Hunninghake, K. Lenz, P. Hannan and H. Blackburn.

Laboratory of Physiology Hygiene, School of Public Health, University of Minnesota, Stadium Gate, 27, 611 Beason Street SE, Minneapolis, MN 55455.

Annals of Internal Medicine, **94**, 7 (Jan. 81)

R81F124. The elevation of α -fetoprotein messenger RNA in regenerating rat liver.

Jen-Fu Chiu, T. Gabryelak, P. Commey & M. Massari

College of Medicine, Department of Biochemistry, University of Vermont, Burlington, Vermont 05405.

Biochemical & Biophysical Research Communications, **98**, 250 (15 Jan. 81)

R81F125. "1-Epicatechin-a novel antidiabetic drug".

B. K. Chakravorthy, S. Gupta, S. Gambhir & K. D. Gode

Department of Pharmacology, Institute of Medical Sciences, Banaras Hindu University, Varanasi-221 005.

Indian Drugs, **18**, 185 (Feb. 81)

R81F126. Associations of serum high density lipoprotein and total cholesterol with total cardiovascular and cancer mortality in a 7-year prospective study of 10 000 men.

S. Yaari, U. Coldbourt*, S. E. Zohar & H. N. Neufeld

Heart Institute, Chaim Sheba Medical Centre, Tel Hashomer 52621, Israel.

Lancet, **I**, 1011 (9-May, 81).

R81F127. Evidence for a new activation of rat liver phosphofructokinase.

T. H. Claus, J. Schlumpf, J. Pilgis, R. Johnson & S. J. Pilgis

Department of Physiology, Vanderbilt University, Nashville, TN 37232.

Biochemical & Biophysical Research Communications, **98**, 359 (30 Jan. 81)

R81F128. Glucose induced membrane changes detected by fluorescence polarization in endocrine pancreatic cells.

J. Deleers, J. M. Ruysschaert & W. J. Malaisse

Laboratories of Experimental Medicine and Physical Chemistry of Macromolecules, Brussels University, Brussels Belgium.

Biochemical & Biophysical Research Communication, **98**, 255 (15 Jan. 81)

R81F129. Glycogen metabolism in epididymal spermatozoa of developing mice.

G. T. Panse & A. R. Sheth

Institute for Research in Reproduction (ICRM), Bombay-400 012.

Indian J. of Experimental Biology, **19**, 183 (Feb. 81)

R81F130. Histological evidence of protection by *Indigofera tinctoria* Linn, against carbon tetrachloride induced hepatotoxicity-an experimental study.

K. K. Anand, D. Chand, B. J. Ray Ghatak & R. K. Arya

Regional Research Laboratory, Jammu Tawi-180 001.

Indian J. of Experimental Biology, **19**, 298 (March 81)

R81F131. Hormonal requirements for growth of arterial smooth muscle cells *in vitro*: an endocrine approach to atherosclerosis.

R. Weinstein, M. B. Stemerman & T. Maciag

Department of Medicine, Charles A. Dana Research Institute, Boston, Massachusetts 02215, USA.

Science, **212**, 818 (15 May 81)

R81F132. Immunofluorescence studies of thyroid gland in diabetes mellitus.

L. Ray & A. F. Michael

Department of Medicine and Pediatrics, University of Minnesota, Minneapolis, Minnesota 55455, USA.

Lancet, **I**, 671 (21 March 81)

R81F133. Inhibition and inactivation of liver aldolase.

J. M. Waud, E. Feldman & K. J. Schray*

Department of Chemistry and the Centre for Health Sciences, Lehigh University Bethlehem, Pennsylvania 18015.

Archives of Biochemistry & Biophysics, **206**, 291 (Feb. 81)

R81F134. Insulin-like effects of wax bean agglutinin in rat adipocytes.

Yoram Shechter & Ben-Ami Sela

Department of Hormone Research, The Weigmann Institute of Science, Rehovot, Israel.

Biochemical & Biophysical Research Communication, **98**, 367 (30 Jan. 81)

R81F135. *In vivo* studies of carnitine and fatty acid metabolism: Problems with use of anesthetics.

E. P. Brass & C. L. Hoppel

Departments of Pharmacology and Medicine, School of Medicine and Veterans Administration Medical Center, Case Western Reserve University, Cleveland, Ohio 44106.

Analytical Biochemistry, **110**, 77
(1 Jan. 81)

R81F136. Ionophoretic activity of lipids extracted from pancreatic islets.

P. Dieryck, J. Winand & W. J. Malaisse

Laboratories of Biochemistry and Experimental Medicine, Brussels Free University School of Medicine, Brussels, Belgium.

IRCS Medical Science, **9**, 190 (March 81)

R81F137. Levels of glucose dehydrogenases with different substrate specificities in rat and beef livers.

Clark Bublitz

University of Colorado Health Sciences Center, Department of Biochemistry, Biophysics and Genetics, 4200 East Ninth Avenue Denver, Colorado 80262.

Biochemical & Biophysical Research Communications, **98**, 455 (30 Jan. 81)

R81F138. Lipids and bile salt stimulated lipase in human milk of Indian mothers.

P. Srinivasa Rao & B. Belarady

National Institute of Nutrition, Jamana Osmania, P. O. Hyderabad-500 007.

Indian J. of Medical Research, **73**, 36
(March 81)

R81F139. Liver fructose biphosphatase concentration and activity in alloxan induced diabetes.

James C. Donofrio, Carle M. Venezia
Mary Y. Mazzotta

Section of Biochemistry, Mayo Medical School, Rochester, MN55901, USA.

Biochemical Pharmacology, **30**, 98 (1 Jan. 81)

R81F140. The low-molecular-weight acid phosphatase from bovine liver. Isolation, amino acid composition and chemical modification studies.

G. L. Lawrence & R. L. Van Etten*

Department of Chemistry, Purdue University West Lafayette, Indiana, 4790

Archives of Biochemistry & Biophysics, **200**, 122 (Jan. 81)

R81F141. Metabolism of lipids in *Epidermophyton floccosum*.

A. Chopra & G. K. Khaller*

Department of Biochemistry, Postgraduate Institute of Medical Education and Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 32
(March 81)

R81F142. Modification of glybenclamide hypoglycaemia by phenytoin in rabbits.

C. Singh, K. K. Saxena, B. Gupta, K. Srivastava* & D. N. Prasad

Department of Pharmacology, L.L.R.M. Medical College, Meerut-250 012.

Indian J. of Experimental Biology, **19**, 54 (Jan. 81)

R81F143. Nature of endosulfon induced blood sugar lowering.

Barooah, P. S. R. Murthy & S. K. Mukherjee

Division of Toxicology & Experimental Medicine, Central Drug Research Institute, Lucknow, India.

Indian J. of Experimental Biology, **18**, 1446 (Dec. 80)

R81F144. A new approach to serial monitoring of blood glucose levels peripheral nerve conduction velocities & lenticular changes using unanaesthetized streptozotocin diabetic rats, following chronic administration of antidiabetic agents.

J. David, G. D. Wagle, P. K. Talwalker & R. S. Crewal

CIBA-Geigy Research Centre, Goregaon, Bombay-400 003.

Indian J. of Experimental Biology, **19**, 49 (Jan. 81)

R81F145. Product inhibition during the hepatic microsomal N-demethylation of aminopyrine in the rat.

Aalt Bast & Jan Noordhock

Department of Pharmacology, Faculty of Pharmacy, State University Utrecht, Catharijnesirgel 60, 3511 GH Utrecht, The Netherlands.

Biochemical Pharmacology, **30**, 19 (1 Jan. 81)

R81F146. Purification and partial characterization of linoleoyl-CoA desaturase from rat liver microsomes.

Takaka Okayasu, M. Nagao, T. Ishibashi & Y. Imai

Department of Biochemistry, Hokkaido University School of Medicine, Sapporo 060, Japan.

Archives of Biochemistry and Biophysics, **206**, 21 (Jan. 81)

R81F147. Regulation of ornithine transcarbamylase activity in neonatal rat liver.

C. Gautier & R. Vaillant

Laboratoire Endocrinologie, ERA 891, Faculte des Sciences, University de Haute normandie, 76130 mont-saint, Aignan.

Biochemistry & Biophysical Research Communication, **98**, 51 (15 Jan. 81)

R81F148. Regulation of plasma cholesterol by lipoprotein receptors.

M. S. Brown, P. T. Kovanen & J. L. Goldstein

Department of Molecular Genetics, University of Texas Health Science Center, 5323 Harry Hines Boulevard, Dallas 75235, USA.

Science, **212**, 628 (8 May 81)

R81P149. Relationship between plasma cholesterol level and erythrocytes shape in rabbits on alterogenic diet and onion extracts.

T. M. Vatsala & M. Singh

Biomedical Engineering Division, Indian Institute of Technology, Madras 600 036.

Current Science, **50**, 211 (5 March 81)

R81F150. Research in diabetes care.

M. M. S. Ahuja

Department of Medicine, All India Institute of Medical Sciences, New Delhi.

J. of the Indian Medical Association, **75**, 229 (Dec. 80)

R81F151. Selective effects of somatostatin 14,-25 and 28 on *in vitro* insulin and glucagon secretion.

L. Mandarino, D. Stenner, W. Blanchard, S. Nissen, J. Gerich*, N. Ling, P. Brazeau, P. Bohlen, F. Esch & R. Guillemin.

Endocrinology Research Unit, Dept. of Medicine & Physiology, Mayo Medical School & Mayo Clinic Rochester, Minnesota 55901, USA.

Nature, **291**, 76 (7 May 81)

R81F152. Studies of the lungs in diabetes mellitus II phospholipid analysis on the surfactant from broncho-alveolar lavage fluid of alloxan-induced diabetic rats.

K. Sugahara, K. Ezaki, T. Kaneko, T. Morioka & H. Maeda

Department of Anesthesiology, Kumamoto University Medical School, Kumamoto City 860, Japan.

Biochemical & Biophysical Research Communication, **98**, 163 (15 Jan. 81)

R81F153. Studies on the effects of 2-deoxy-D-glucose on glucose uptake & glycolysis in respiratory-deficient yeast cells.

I Gupta, V. K. Jain* & R. K. Mishra

Department of Biophysics, All India Institute of Medical Sciences, New Delhi-110 029.

Indian J. of Experimental Biology, **19**, 231 (March 81)

R81F154. Synthetic glycolipids: Interaction with galactose-binding lectin and hepatic cells.

P. Ghose, B. K. Bachhawat & A. Surodia

Enzymes Engineering Laboratory, Indian Institute of Experimental Medicine, 4, Raja S. C. Mullick Road, Calcutta-700 032.

Archives of Biochemistry and Biophysics, **200**, 454 (Feb 81)

R81F155. Vitamin B12 deficiency due to a low-cholesterol diet in a vegetarian.

M. F. Murphy

Department on Haematology, St. Bartholomew's Hospital, London EC1A 7BE, England.

Annals of Internal Medicine, **94**, 57 (Jan. 81)

G INFECTIOUS DISEASES

Viral

R81G059. Bacteriophage purification by Gel chromatography.

B. Sain and S. Erdee

Institute of Biochemistry, Biological Research Centre, Hungarian Academy of Sciences, Szeged 6701, P. O. Box 521, Hungary.

Analytical Biochemistry, **110**, 128 (1 Jan. 81)

R81G060. Effects of tunicamycin on the physical properties and antiviral activities of murine L cell interferon.

E. A. Havell and W. A. Carter

Trudeau Institute, Inc. Saranac Lake, New York 12983

Virology, **108**, 80 (15 Jan. 81)

R81G061. Interferon production in adults with respiratory syncytical viral infection.

C. B. Hall, G. Douglas and R. L. Simons

University of Rochester, N. Y 14642

Annals of Internal Medicine, **94**, 53 (Jan. 81)

Bacterial

R81G062. Antitubercular agents: Pt-IV-Synthesis of thiourea derivatives containing diphenylsulphide-2-carboxylic acid & thiaxanthen-9-one moieties.

P. V. Arur & Sheshgiri N. Kulkarni*

National Chemical Laboratory, Poona-411 008.

Indian J. of Chemistry, **20B**, 50 (Jan. 81)

R81G063. Bacteriology of diarrhoea in infants and children.

T. Joseph

Department of Microbiology, Sophia College, Bhulabhai Desai Road, Bombay-400 026.

Indian J. of Microbiology, **20**, 189 (July-Sept. 80)

R81G064. Biochemical changes during the life cycle of *Acanthamoeba culbertsoni*.

U. S. Singh & V. K. Mohan Rao

Division of Biochemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 139 (Feb. 81)

R81G065. Biochemical studies on lipopolysaccharide isolated from agglutinable and non-agglutinable strains of *V. cholerae*.

B. Guhathakurta, D. Sasmal, A. Dutta, A. K. Sen & A. K. Mukerjee

National Institute of Cholera & Enteric diseases, Calcutta-700 016.

Indian J. of Biochemistry & Biophysics, **17**, 467 (Dec. 80)

R81G066. Drug resistance in bacteria. Some genetic and molecular aspects.

R. S. Khopar

Microbiology Section, Biology Division, I D P L Research Centre, Hyderabad.

Indian Drugs and Pharmaceuticals Industry, **15**, 33 (Sep.-Oct. 80)

R81G067. Effect of rifampicin treatment on *Mycobacterium avium* infection in carbon tetrachloride treated rabbits.

N. B. Singh, A. Srivastava, I. S. Mathur, H. P. Gupta & S. K. Gupta

Division of Microbiology, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 201 (Feb. 81)

R81G068. *Escherichia coli* and acute diarrhoeal disease. Editorial.

R. B. Sack

Department of Medicine, The Johns Hopkins University School of Medicine and Baltimore City Hospitals, Baltimore Maryland.

Annals of Internal Medicine, **94**, 129 (Jan. 81)

R81G069. Preliminary evaluation of a rapid sensitivity testing method for common gram negative enteric bacilli

P. Pal, S. C. Sanyal & R. S. Sen

Department of Microbiology, Institute of Medical Sciences, Banaras Hindu University, Varanasi-221 005.

Indian J. of Medical Research, **73**, 31 (March 81)

R81G070. Specificity of isoniazid action against mycobacteria and possible mechanism for the development of drug resistance.

K. P. Gopinathan

Microbiology and Cell Biology Laboratory, Indian Institute of Science, Bangalore-560 012.

Current Science, **50**, 216 (5 March 81)

R81G071. Synthesis and antimicrobial activity of 3-methyl-5-aryl-4-(N-substituted/-Sulphamylbenzeneazo) isoxazoles. Pt. XXI.

H. C. Mutreja, G. S. Saharia & H. R. Sharma

Department of Chemistry, University of Delhi, Delhi-110 007.

Indian J. of Pharmaceutical Sciences, **43**, (Jan.-Feb. 81)

R81G072. Transferable drug resistance (R-factor) in *Escherichia coli* isolated from children having acute diarrhoea.

C. Agarwal, R. P. Panhotra, V. Agnietri and B. N. S. Walia

Department of Medical Microbiology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 308 (March 81)

Parasitic

R81G073. Synthesis of 3-arylglucylhydrazono-2-indolinones as amoebicidal and antibacterial agents.

R. S. Verma & P. K. Garg

Department of Chemistry, Lucknow University, Lucknow-226 007.

Indian J. of Pharmaceutical Sciences, **43**, 8 (Jan.-Feb. 81)

R81G074. Lipid composition of the amoeba, *Hartmanella culbertsoni* and its subcellular fractions.

A.A. Lal & N. K. Garg

Division of Biochemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Biochemistry & Biophysics, **17**, 462 (Dec. 80)

R81G075. *Plasmodium berghei*: The *in vitro* immune response.

S. W. C. Norby and N. E. Alger

Department of Medicine T-006, University of California at San Diego, La Jolla, California, USA.

Experimental Parasitology, **51**, 104 (1 Feb. 81)

R81G076. *Plasmodium berghei*: Modification of sialic acid on red cells from infected mouse blood.

R. J. Howard and Karen P. Day

Laboratory of Parasitic Diseases, National Institute of Allergy & Infectious Diseases, NIH, Bethesda, Maryland 20205, USA.

Experimental Parasitology, **51**, 95 (1 Feb. 81)

R81G077. *Plasmodium falciparum*: Assay of invasion of erythrocytes.

G. Lamout, A. Saul and C. Kidson

Queensland Institute of Medical Research, Brisbane, 41006, Australia.

Experimental Parasitology, **51**, 74 (1 Feb. 81)

R81G078. Pyrimethamine susceptibility status of *P. falciparum* in Karbi-Anglong district of Assam and Adilabad district of Andhra Pradesh.

Shilpi Das, B. N. Barkakaty, C. V. R. Mohan Rao, R. B. Ghosh, A. L. Kapoor, R. G. Roy and S. Pattanayak

Regional Office for Health and Family Welfare, Shillong.

J. of Communicable Diseases, **12**, 126 (Sept. 80)

R81G079. Quinolines and related compounds as potential antimalarials.

K. K. Pandey

Department of Chemistry, Lucknow University, Lucknow-226 007.

Defence Science Journal, **30**, 191 (Oct. 80)

R81G080. *Trypanosoma brucei*: Host parasite interactions parasite destruction by salicylhydroxamic acid and glycerol in mice.

B. O. Amole and A. B. Clarkson, Jr.

Division of Parasitology, Department of Microbiology, New York University Medical Center 550 First Avenue, New York 10016, USA.

Experimental Parasitology, **51**, 133 (1 Feb. 81)

R81G081. *Trypanosoma vivax*: Absence of host protein on the surface coat.

A. L. W. De Gel and L. Rovis

International Laboratory for Research on Animal Diseases (ILRAD), P. O. Box 30709, Nairobi, Kenya.

Experimental Parasitology, **51**, 124, (1 Feb. 81)

R81G082. *Schistosoma mansoni* and *Schistosoma haematobium*: differences in development.

C. S. Burden & J. E. Ubelaker

Department of Biology, Southern Methodist University, Dallas, Texas 75275, USA.

Experimental Parasitology, **51**, 28 (1 Feb. 81)

R81G083. *Schistosoma mansoni*: Decarboxylation of 5-hydroxytryptophan, L-Dopa, and L-Histidine in adult and larval schistosomes.

B. A. Catto

Department of Pharmacology, School of Medicine, Case Western Reserve University, Cleveland, Ohio 44106, USA.

Experimental Parasitology, **51**, 152 (1 Feb. 81)

R81G084. Solar eclipse and microfilaraemia.

Ram Sahai, M. V. V. L. Narasimham, A. Datta, A. Chandrasekharan and C. K. Rao

National Institute of Communicable Diseases, 22, Sham Nath Marg, Delhi 110 054.

J. of Communicable Diseases, **12**, 161 (Sept. 80)

R81G085. Synthesis of 2, 4 disubstituted 1-phenylnaphthalenes and 5 substituted benzo [c] fluoren-7(H) ones as possible antihook worm agents.

Shive Kumar, Mahavir Prasad & A. P. Bhaduri

Division of Medicinal Chemistry, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Chemistry, **20B**, 36 (Jan. 81)

R81G086. *Brugia pahangi*: Feeding and nutrient uptake in vitro and in vivo

R. E. Howells and S. N. Chen

Department of Parasitology, Liverpool School of Tropical Medicine, Pembroke Place, Liverpool L 35 QA, England, UK

Experimental Parasitology, **51**, 42 (1 Feb. 81)

R81G087. Changes in surface topography, lipid phospholipases of *Hertella culbertsoni* cultured in presence cholesterol.

A. Lal, S. C. Maitra & A. K. Garg

Central Drug Research Institute,
Lucknow-226 001.

Indian J. of Experimental Biology, **118**, 1387
(Dec. 80)

R81G088. Clinical profile of intestinal helminthic infection from eastern parts of India.

P. Gopinathan

Military Hospital, Silchar, Assam.

J. of Communicable Diseases, **12**, 151 (Sept. 80)

R81G089. Comparaison des activités antiparasitaires de deux séries d'aldimines nitro-5 furanne et thiophène.

Ph. Gayaral, M. C. Rigother, J. C. Gantier, R. C. Coumes, J. P. Gorrichon
et A. Gaset, F. Dusset

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de Pharmacie, USR de Chimie Thérapeu-
tique 3, rue J. B. Clement, 92290 Cha-
tenay-Malabry.

European J. of Medicinal Chemistry, **16**, 151
(March-April 81)

R81G090. *Dirofilaria immitis*: Parasite-specific humoral and cellular immune responses in experimentally infected dog.

G. J. Weil and E. A. Ottesen

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Institute of Allergy and Infectious
Diseases, National Institutes of Health,
Bethesda, Maryland 20205, USA.

Experimental Parasitology, **51**, 80 (1 Feb. 81)

R81G091. *Hymenolepis diminuta*: Worm loss and worm weight loss in long-term infections of the rat.

A. W. Pike and L. H. Chappell

Department of Zoology, University of
Aberdeen, Tillydrone Ave, Aberdeen,
Scotland, AB92TN, UK.

Experimental Parasitology, **51**, 35 (1 Feb. 81)

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A. Subrahmanyam.

Hindustan Antibiotics Research Centre,
Pimpri, Poona-411 018.

Hindustan Antibiotics Bulletin, **22**, 62, (Feb.-
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H ANTINEOPLASTIC AGENTS

R81H020. Changes in phospholipid and fatty acid composition in differentiated friend leukaemic cells.

G. Zwingelstein, H. Tapiero*, J. Portoukalian & A. Fourcade

Department de Pharmacologie Cellulaire et Moléculaire INSERM, Unité 50, ICIG, 14-16 Avenue Paulvaillant Couturier, 94800 Villejuif, France.

Biochemical and Biophysical Research Communications, **98**, 349 (30 Jan. 81)

R81H021. Effects of acronycine and of cytochalasin B on the division of rat leukemia cells.

R. S. Low and N. Auersperg

Department of Anatomy and Zoology, The University of British Columbia, Vancouver, BC V6T 1W5, Canada.

Experimental Cell Research, **131**, 15 (Jan. 81)

R81H022. Effects of insulin and oxytocin on macromolecular synthesis in a cell line of human breast cancer in long term culture.

R. Avola, V. Rizza, R. D. Agta, N. Ragusa & G. Ricuri

Institute di Chimica Biologica e di Patologia Medica, Università di Catania, Italy.

IRCS Medical Science, **9**, 224 (Mar. 81)

R81H023. Induction of mouse erythroleukemia cells by microinjection of inducing compound.

E. G. Deacumakos, L. Killian, L. Le and W. F. Anderson

Rockefeller University, New York, NY 10021, USA.

Experimental Cell Research, **131**, 73 (Jan. 81)

R81H024. Influence of psychoactive and nonpsychoactive cannabinoids on cell proliferation and macromolecular biosynthesis in human cells.

Manuel J. Mon, Ali E. Haas, Janet, L. Stein & Gary S. Stein*

Department of Biochemistry and Molecular Biology, University of Florida College of Medicine, Gainesville, FL 32610, USA.

Biochemical Pharmacology, **30**, 31 (1 Jan. 81)

R81H025. α -lactalbumin is not a marker of human hormone dependent breast cancer.

L. Hall, R. K. Craig*, M. S. Davies, D. N. L. Ralphs & P. N. Campbell

Courtauld Institute of Biochemistry, The Middlesex Hospital Medical School, London, W1P 7PN, UK.

Nature, **290**, 602 (16 Apr. 81)

R81H026. Successful tumour immunotherapy with cimetidine in mice.

J. E. Osband, Y. J. Shen, M. Shlesinger, J. Brown, D. Hamilton, E. Cohen, P. Davin & R. McCaffrey

Department of Medical Oncology, University Hospital, 75E Newton St., Boston, Massachusetts 02118, USA.

Lancet, **1**, 636 (21 Mar. 81)

R81H027. Regression of aflatoxin B₁-induced hepatocellular carcinomas by reduced glutathione.

A. M. Novi

Department of Pathology, Dusseldorf University, D-4000 Dusseldorf, Federal Republic of Germany.

Science, **212**, 541 (1 May 81)

R81H028. A statewide approach to diethylstilbestrol—The New York program.

D. M. Glebatis, & D. T. Janerich

Bureau of Cancer Control, Nork, New York State Department of Health, Albany, NY, 12237, USA.

New England J. Medicine, **304**, 47 (1 Jan 81)

R81H029. Strategies of viral oncogenesis.

J. Wyke

Tumour Virology Laboratory, Imperial Cancer Research Fund Laboratories, London, UK.

Nature, **290**, 629 (23 Apr 81)

R81H030. A study of the electronic structure of some phenyl triazenes and their antitumour activity.

T. Blair & G. A. Webb*

Department of Chemical Physics, University of Surrey, Guilford, Surrey, England.

European J. of Medicinal Chemistry, **16**, 157 (Mar-Apr. 81)

R81H031. Synthesis of steroidal N, N-bis (2-chloroethyl)-carbamates and their effects in murine leukemias.

P. Catsoulacos & Politis

Laboratory of Pharmaceutical Chemistry, University of Patras, Patras, Greece.

European J. of Medicinal Chemistry, **16**, 181 (Mar.-Apr. 81)

R81H032. Teratogenicity of cyclophosphamide in a coupled microsomal activating/embryo culture system.

Kirk T. Kitchin, I. Beat, P. Schmid & M. K. Sanyal

Environmental Toxicology Division, Health Effects Research Laboratory, US Environmental Protection Agency, Research Triangle Park, NC 27711, USA.

Biochemical Pharmacology, **30**, 59 (1 Jan. 81)

R81I063. Acetylator phenotype determination in the rabbit sulphamethazine or sulphadiazine, the choice of a substrate.

P. Du Souich, H. Courteau

Department of Pharmacology, Faculty of Medicine, University of Montreal and Hospital Hotel Diea of Montreal, Montreal, Quebec, Canada H3C 3J7.

J. of Pharmacy & Pharmacology, **33**, 261 (Apr. 81)

R81I064. Calmodulin-dependent high-affinity cyclic AMP phosphodiesterase in liver membranes.

J. A. Smoake, L. S. Johnson & G. T. Peake

New Mexico Tech. Socorro, New Mexico 87801, USA.

Archives of Biochemistry and Biophysics, **206**, 331 (Feb. 81)

R81I065. Chloroquine and primaquine-induced alterations of glucose metabolism in the uninfected red cell.

S. N. Kelman, S. G. Sullivan and A. Stern*

Department of Pharmacology, New York University Medical Center, School of Medicine, 550 First Ave., New York, NY 10016, USA.

Biochemical Pharmacology, **30**, 81 (1 Jan. 81)

R81I066. Comparison of extracellular and intracellular level of cyclic AMP between the toxinogenic and nontoxinogenic strains of *Vibrio*

M. K. Chakraborty & U. Ganguly

National Institute of Cholera & Enteric Diseases, Calcutta 700 016.

Indian J. of Experimental Biology, **19**, (Feb. 81)

R81I067. A cyanine dye distinguishes between cycling and non-cycling fibroblasts.

R. L. Cohen, K. A. Muirhead, J. E. Gilman, A. S. Waggoner & P. K. Horan*

University of Rochester Medical Center, Department of Pathology, P. O. Box 62, 601 Elmwood Avenue, Rochester, New York 14642, USA.

Nature, **290**, 593 (April 81)

R81I068. Cyclic adenosine 3', 5'-monophosphate: regulation of catabolite repression in microorganisms.

A. Arunakumari & A. Mahadevan

Centre of Advanced Study in Botany, University of Madras, Madras 600 005, India.

J. of Scientific and Industrial Research, **4**, 188 (Mar. 81)

R81I069. Effect of 1-aminoproline on methionine metabolism in rats.

Kimoto, T. Ogawa & K. Sasaoka

Department of Nutrition, School of Medicine, Takushwa University, Takushwa 770, Japan.

Archives of Biochemistry and Biophysics, **206**, 105 (Feb. 81)

R81I070. Effect of protein deprivation and subsequent rehabilitation on the intestinal transport of L-methionine in vivo.

K. Kansal & A. Malik

Division of Human Nutrition and Diets, National Dairy Research Institute, Karnal-130 001, Haryana.

Indian J. of Physiology & Pharmacology, **24**, 167 (Oct.-Dec. 80)

R81I071. The effects of reactive blue 19 as an antagonist of ATP on the isolated urinary bladders of guinea pig and rat.

J. K. Choo

Department of Pharmacology, Victoria College of Pharmacy, Parkville, Victoria 3052, Australia.

J. of Pharmacy & Pharmacology, **33**, 248 (1 Apr. 81)

R81I072. Ferroxidase II. The essential role of copper in enzymatic activity.

A. Garniter, L. Tosi* & M. Steinbuch

Department de Recherches Physiques, Universite Pierre et Maria Curie, Laboratoire Associe au CNRS No. 71,4 Place Jussieu 75230 Paris Cedex 05, France.

Biochemical and Biophysical Research Communication, **98**, 66 (15 Jan. 81)

R81I073. Inhibition by Ca^{2+} of the incorporation of myo-inositol into phosphatidylinositol.

K. Egawa, T. Takenawa & B. Sacktor*

Laboratory of Molecular Aging, National Institute of Health, Baltimore City Hospitals, Baltimore, MD 21224, USA.

Molecular and Cellular Endocrinology, **21**, 29 (Jan. 81)

R81I074. Inhibition of rabbit muscle glycogen phosphorylase by aromatic compounds.

T. P. Thomas & G. Philip

Department of Marine Sciences, University of Cochin, Cochin-682 016.

Indian J. of Biochemistry & Biophysics, **17**, 458 (Dec. 80)

R81I075. Molecular properties of the adrenergic α -receptor. 4'. topographical and structural differences between tissue-specific binding sites as revealed by benextramine and analogues.

C. Melchiorre, M. Giannella, L. Brasili, B. G. Benfey & B. Belleau

Institute of Pharmaceutical Chemistry, University of Camerino, 62032 Camerino (MC) Italy.

European J. of Medicinal Chemistry, **16**, 111 (Mar.-Apr. 81)

R811076. Multifunctionality of lipoamide dehydrogenase: activities of chemically trapped monomeric and dimeric enzymes.

C. S. Tsai, D. M. Templeton & A. J. Wand

Department of Chemistry and Institute of Biochemistry, Carleton University, Ottawa, Ontario K1S 5B6, Canada.

Archives of Biochemistry and Biophysics, **206**, 77 (Jan. 81)

R811077. A new simple preparation method for Na K-ATPase-rich membrane fragments.

A. Yoda & S. Yoda

Department of Pharmacology, University of Wisconsin Medical School, Madison, Wisconsin 53706, USA.

Analytical Biochemistry, **110**, 82 (1 Jan. 81)

R811078. Quantitative estimation of the release of erythrocyte membrane glycopeptide under different metabolic conditions.

M. Suhail

Studies and Research in Biological Sciences, University of Jabalpur, Jabalpur, India.

National Academy Science Letters, **3**, 284 (Sep. 80)

R811079. Ribonucleases and deoxyribonucleases in *Plasmodium knowlesi*.

H. S. Banyal, V. C. Pandey & G. Dutta

Division of Microbiology & Biochemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, (Feb. 81)

R811080. Stimulation of sodium transport across the teleost urinary bladder by urotensin II.

C. A. Loretz & H. A. Bern

Department of Zoology and Cancer Research Laboratory, University of California, Berkeley, California 94720, USA.

General and Comparative Endocrinology, **325** (Mar. 81)

R811081. Structural requirements for adrenergic- α -receptor covalent occupancy by chiral tetramine disulfides.

L. Brasili, M. Giannella, C. Melchiorri, B. Beileau & B. G. Benfey

Institute of Pharmaceutical Chemistry, University of Comerino 62032, Camorino (MC) Italy.

European J. of Medicinal Chemistry, **16**, (Mar.- Apr. 81)

MOLECULAR BIOLOGY

**076. An inducible DNA replica-
cell division coupling mechanism**
E. coli.

Luisman & R. D'Ari

Institut de Recherche en Biologie Mole-
culaire, 2, Place Jussieu (Tour 43), 75221
Paris Cedex 05, France.

Nature, **290**, 797 (30 Apr. 81)

**077. Antibiotic cross-resistance
patterns of lysozyme resistant
staphylococci.**

Chakraborty & S. G. Dastidar & A. N.
Chakraborty

Division of Microbiology, Department of
Pharmacy, Jadavpur University, Calcutta-
700 032.

Indian J. of Experimental Biology, **19**, 176
(Feb. 81)

**81J078. Antibodies, introns and
cosynthetic versatility.**

I. Robertson & M. Hobart

Nature, 4, Little Essex Street,
WC2R 3LF, London.

Nature, **209**, 543 (16 Apr. 81)

**81J079. Arrangements and rearran-
gements of sequences flanking the
two types of rDNA insertion in *D.*
melanogaster.**

H. Roiha, J. R. Miller, L. C. Woods &
D. M. Glover

Cancer Research Campaign, Imperial
College of Science and Technology,
London SW7 2AZ, UK.

Nature, **209**, 749 (30 Apr. 81)

**R81J080. Bacteriophage T3 DNA
binding protein interaction with DNA.**

M. Yamagishi, H. Fujisawa* & T.
Minagawa

Botanical Department, Faculty of Science,
Kyoto University, Kyoto 606, Japan.

Virology, **109**, 148 (Feb. 81)

**R81J081. Capsid-DNA complexes in
the DNA packaging pathway of
bacteriophage T7: Characterization
of the capsids bound to monomeric
and concatemeric DNA.**

P. Serwer & R. H. Watson

Department of Biochemistry, The Uni-
versity of Texas, Health Science Center,
San Antonio, Texas 78284, USA.

Virology, **108**, 164 (15 Jan. 81)

**R81J082. Changes in DNA during
meiosis in a repair-deficient mutant
(*rad 52*) of yeast.**

M. A. Resnick, J. N. Kasimos, J. C.
Game, R. J. Braun & R. M. Roth

National Institute of Environmental
Health Sciences, Laboratory of Molecular
Genetics, Research Triangle Park, North
Carolina 27709, USA.

Science, **212**, 543 (May 81)

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R. G. Duggleby, H. Kinns & J. I. Rood
Department of Biochemistry, University of Queensland, St. Lucia, 4067, Australia.

Analytical Biochemistry, **110**, 49 (1 Jan. 81)

R81J084. Effect of temperature on gene transfer in *Vibrio cholerae* crosses between P + & P—classical strains of *V. cholerae*.

P. Sridhar & H. Palasa
Department of Microbiology, Osmania University, Hyderabad, India.

Indian J. of Experimental Biology, **19**, 40 (Jan. 81)

R81J085. Gene control puzzle begins to yield.

J. L. Marx†
Science, **212**, 653 (8 May 81)

R81J086. A general, fast and sensitive micromethod for DNA determination: application to rat and mouse liver, rat hepatoma, human leukocytes, chicken fibroblasts, and yeast cells.

B. Fiszer-Szafarz, D. Szafarz & A. Guevara de Murillo
Institut Curie Biologie, Centre Universitaire, Baltiment 111, 91405, Orsay Cedex, France.

Analytical Biochemistry, **110**, 165 (1 Jan. 81)

R81J087. Genes of lymphocytes: diverse means to antibody diversity.

N. Robertson
Nature, 4, Little Essex Street WC 3LF, London.

Nature, **290**, 625 (23 Apr. 81)

R81J088. Genetic recombination between phage HK022 λ and ϕ 80.

T. S. Dhillon, E. K. S. Dhillon* & A. N. C. Lai

Biology Department, Chinese University of Hong Kong, Shatin, N. T. Hong Kong.

Virology, **109**, 198 (Feb. 81)

R81J089. Initiation and termination of vaccinia virus DNA replication.

B. G. T. Pago, M. Oshea & P. Freimuth
Center for Experimental Cell Biology, Mount Sinai School of Medicine, New York, 10029, USA.

Virology, **108**, 241 (15 Jan. 81)

R81J090. Interacting genes in nematode dauer larva formation.

D. L. Riddle, M. M. Swanson & P. Albert

Division of Biological Sciences, University of Missouri, Columbia, Missouri 65211 USA.

Nature, **290**, 668 (23 Apr. 81)

† Address not available.

J091. The interaction of adriamycin with nuclear DNA: Evidence for a drug induced compaction of relaxed chromatin.

Waldes & M. S. Center

Division of Biology, Kansas State University, Manhattan, Kansas 66506, USA.

Biochemical and Biophysical Research Communications, **98**, 95 (15 Jan. 81)

R81J092. Isoquanosine: isolation from an animal.

A. Fuhrman, G. J. Fuhrman, R. J. Pachman & H. S. Mosher

Department of Physiology, Stanford University, Stanford, California 94405, USA.

Science, **212**, 557 (1 May 81)

R81J093. Isolation of a biologically active macrophage receptor for the third component of complement.

R. J. Schneider, A. Kulczycki Jr., S. K. Law & J. P. Atkinson

Howard Hughes Medical Institute Laboratories, Division of Rheumatology, Washington University, School of Medicine, St. Louis, Missouri, 63110, USA.

Nature, **290**, 789 (30 Apr. 81)

R81J094. Left-handed DNA in restriction fragments and a recombinant plasmid.

J. Klysik, S. M. Stirdivant, J. E. Larson, P. A. Hart & R. D. Wells

College of Agricultural & Life Sciences, Department of Biochemistry, University of Wisconsin, Madison, Wisconsin 53706, USA.

Nature, **290**, 672 (23 Apr. 81)

R81J095. Length of DNA from bacteriophage T2 and its mode of packing inside the phage head.

A. N. Ghosh & N. N. Dasgupta

Electron Microscope Centre, Department of Physics, University College of Science, Calcutta-700 009.

Proceedings of the Indian National Science Academy B, **46**, 448 (Aug. 80)

R81J096. Major rearrangement in the human B-globin gene cluster.

R. W. Jones, J. M. Old, R. J. Trent, J. B. Clegg & D. J. Weatherall

MRC Molecular Haematology Unit, Nuffield Department of Clinical Medicine, John Radcliffe Hospital, Oxford OX3 9DU, UK.

Nature, **291**, 39 (7 May 81)

R81J097. Measles virus nucleotide sequences: detection by hybridization in situ.

A. T. Haase, P. Ventura, C. J. Gibbs, Jr. & W. W. Tourtellotte

Veterans Administration Medical Center, San Francisco 94121, California, USA.

Science, **212**, 672 (8 May 81)

R81J098. The method of crosslinking histones to DNA partly depurinated at neutral pH.

E. S. Levina, S. G. Bavykin, V. V. Shick & A. D. Mirzabekov

Institute of Molecular Biology, USSR Academy of Sciences, 117984 Moscow B 334, USSR.

Analytical Biochemistry, **110**, 93 (1 Jan. 81)

R81J099. Molecular cloning of foot and mouth disease virus genome and nucleotide sequences in the structural protein genes.

J. C. Boothroyd, P. E. Highfield, G. A. M. Cross, D. J. Rowlands, P. A. Lowe, F. Brown & T. J. R. Harris

Department of Immunochemistry, Wellcome Research Laboratories, Langley Court, Beckenham, Kent BR3 3BS, UK.

Nature, **290**, 800 (30 Apr. 81)

R81J100. Mutation caused by human phagocytes.

S. A. Weitzman & T. P. Stossel

Hematology-Oncology Unit, Massachusetts General Hospital, Boston 02114, MA, USA.

Science, **212**, 546 (1 May 81)

R81J101. The origin of the carbon chain in the thiazole moiety of thiamine in *Escherichia coli*: incorporation of deuterated 1-deoxy-D-threo-2-pentulose.

M. Therisod, J. C. Fischer & B. Estramarcix

Laboratoire de Chimie Organique Multifonctionnelle, Université de Paris-Sud 91405 Orsay Cedex, France.

Biochemical & Biophysical Research Communications, **98**, 374 (30 Jan. 81)

R81J102. Plasmid composition *Staphylococcus* species.

W. E. Kloos, B.S.Orban & D. D. Wall

Department of Genetics, North Carolina State University, Raleigh, NC 276 USA.

Canadian J. of Microbiology, **27**, 271 (Mar. 81)

R81J103. Plasmid specification resistance to antibacterial compounds in environmental *Citrobacter freundii*.

R. A. Austin & T. J. Trust*

Department of Biochemistry and Microbiology, University of Victoria B.C. Canada V8W 2Y2.

Canadian J. of Microbiology, **27**, 343 (Mar. 81)

R81J104. Problems associated with dose response in steroid hormone activation of structural gene.

R. E. Leake

Department of Biochemistry, University of Glasgow G12B QQ, Scotland.

Molecular and Cellular Endocrinology, **2**, 1 (Jan. 81)

R81J105. Regulation of synthesis of *Escherichia coli* ribosomal proteins 1 and L11.

J. Brost, P. Cudwell & H. Weissbach

Roche Institute of Molecular Biology,
Nutley, New Jersey, 07110, USA.

Archives of Biochemistry and Biophysics, **206**,
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R81J106. Senate commences hearings on "human life".

C. Holden †

Science, **212**, 648 (8 May 81)

R81J107. Short-lived cytoplasmic regulators of gene expression in cell hybrids.

C. R. Kahn, R. Bertolotti, M. Ninio &
M. C. Weiss

Section on Cellular & Molecular Physiology,
Building 10, Room 8S-243, National
Institute of Health, Bethesda, Maryland
20205, USA.

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H. S. Lu, P. M. Yuan, J. M. Talent and
R. W. Gracy

Department of Chemistry and Biochemistry,
North Texas State University and
Texas College of Osteopathic Medicine,
Denton, Texas 76203, USA.

Analytical Biochemistry, **110**, 159 (1 Jan.
81)

R81J0109. Structure and assembly of bacteriophage T3 tails.

H. Matsuo-kato, H. Fujisawa* & T.
Minagawa

Botanical Department, Faculty of Science,
Kyoto University, Kyoto 606, Japan.

Virology, **190**, 157 (Feb. 81)

R81J110. Structure of catabolite gene activator protein at 2.2 Å resolution suggests binding to left-handed B-DNA.

D. B. McKay & T. A. Steitz

Department of Molecular Biophysics &
Biochemistry, Yale University, New
Haven, Connecticut 06511, USA.

Nature, **290**, 744 (30 Apr. 81)

R81J111. Structure of the *cro* repressor from bacteriophage and its interaction with DNA.

W. F. Anderson, D. H. Ohlendorf,
Y. Takeda & B. W. Matthews

MRC Group on Protein Structure &
Function, Department of Biochemistry,
University of Alberta, Edmonton, Alberta,
Canada T6G 2H7.

Nature, **290**, 754 (30 Apr. 81)

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O. W. Howarth & L. Y. Lian

Department of Chemistry and Molecular
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ventry CV 4 7AL, UK.

JCS Chemical Communications, **No. 6**, 258
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† Address not available.

R81J113. The synthesis of coliphage T1 DNA: degradation of the host chromosome.

J. R. Christensen, D. H. Figurski & W. H. Schreil

Department of Microbiology, University of Rochester School of Medicine and Dentistry, Rochester, New York 14662, USA.

Virology, **108**, 373 (30 Jan. 81)

R81J114. Tale of the orphaned genes.

R. Lewin †

Science, **212**, 530 (1 May 81)

R81J115. Tissue-specific expression of α -amylase.

R. A. Flavell

National Institute for Medical Research, London, UK.

Nature, **290**, 541 (16 Apr. 81)

R81J116. Total synthesis of bovine pancreatic ribonuclease A. Part I, Synthesis of the protected pentadeca-peptide ester (Positions 110-124).

N. Fujii & H. Yajima*

Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606, Japan.

J. of the Chemical Society: Perkin Transactions I, No. **3**, 789 (1981)

R81J117. Total synthesis of bovine pancreatic ribonuclease. A. Part I, Synthesis of the protected hexatriacontapeptide ester (Positions 89-124).

N. Fujii & H. Yajima*

Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606, Japan.

J. of the Chemical Society: Perkin Transactions I, No. **3**, 797 (1981)

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N. Fujii & H. Yajima*

Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606, Japan.

J. of the Chemical Society: Perkin Transactions I, No. **3**, 804 (1981)

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N. Fujii & H. Yajima*

Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606, Japan.

J. of the Chemical Society: Perkin Transactions I, No. **3**, 811 (1981)

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R81J120. Total synthesis of bovine pancreatic ribonuclease A. Part 5. Synthesis of the protected S-protein positions 21-124) and the protected peptide (positions 1-20).

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Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606, Japan.

Journal of the Chemical Society: Perkin Transactions I, No. 3, 819 (1981)

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Faculty of Pharmaceutical Sciences, Kyoto University, Sakyo-Ku, Kyoto 606 Japan.

Journal of the Chemical Society: Perkin Transactions I, No.3, 831 (1981)

R81J122. Transplantation of germ nuclei in *Paramecium caudatum*. Induction of meiosis in transplanted interphase nucleus.

M. Fujishima & K. Hiwatashi

Biological Institute, Yamaguchi University, Yamaguchi 753, Japan.

Experimental Cell Research, 131, 63 (Jan. 81)

R81J123. Tritiated thymidine incorporation does not measure DNA synthesis in ribavirin-treated human cells.

J. C. Drach, M. A. Thomas, J. W. Barnett, S. H. Smith & C. Shipman, Jr

Dental Research Institute, University of Michigan, Ann Arbor, 48109, USA.

Science, 212, 549 (1 May 81)

R81J124. Two DNA-binding proteins.

D. Davies

National Institute of Health, Bethesda, Maryland, USA.

Nature, 290, 736 (30 Apr. 81)

R81J125. Two phospholipase pools for prostaglandin synthesis in macrophages.

W. Hsueh, U. Desai, F. G. Crussi, R. Lamb & A. Chu

Department of Pathology, Children's Memorial Hospital, Northwestern University Medical School, Chicago, Illinois 60614, USA.

Nature, 290, 710 (23 Apr. 81)

K PHARMACEUTICS

R81K076. Absorption of benzyl penicilin from tablets and capsules.

B. S. Doshi, S. Motiwala & R. D. Kulkarni

Grant Medical College and J. J. Hospital, Bombay-400 008.

Indian Drugs, 18, 164 (Feb. 1981)

R81K077. Affiriation of sterility and apyrogenicity of intravenous fluids.

C. N. Aguwa, G. C. Mittal, J. E. Oghuokiri

Department of Pharmacology & Toxicology, University of Nigeria, Nsukka.

Indian J. of Hospital Pharmacy, **17**, 162 (Nov-Dec. 80)

R81K078. Alkyl isothiocyanates: conformational analysis and structure-activity studies.

I. Tvaroska, P. Gemeiner & L. Drobica

Institute of Chemistry, Slovak Academy of Sciences, Dubravska Cesta 80933 Bratislava, Czechoslovakia.

European J. of Medicinal Chemistry, **16**, 131 (Mar-April 81)

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A. D. Bain, J. Bornas & S. Brownstein

Bruker Spectrospin (Canada) Ltd., 2410 Dunwin Dr., Unit 4 Mississauga, Ont., Canada L5L1J9

Canadian J. of Chemistry, **59**, 723 (15 Feb 81)

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J. Frank

Metrohm A. G. Elektronische Messgeriate fur die Chemie, Herisau

Chimia, **35**, 24 (Jan 81)

R81K081. Characterisation of canadacidin & levorin by means of high-performance size exclusion liquid chromatography.

P. Helboe & M. Thomsen

National Board of Health, Drug Standardisation Laboratory, 378 Frederikssundsvej, DK-2700 Bronshoj, Denmark.

Analyst, **106**, 361 (Mar 81)

R81K82. Chemistry of quinones. Part 7. Synthesis of anthrecyclinon analogues via diels-Alder reaction of 1, 4 anthroquinones.

D. N. Gupta, P. Hodge*, & N. Khan

Department of Chemistry, University of Lancaster, Lancaster LA14Ya.

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R81K083. Colorimetric determination of thiethylperazine maleate in pharmaceutical preparations using molybdophosphoric acid as reagent.

A. N. Nayak, H. S. Yathirajan & U. Subrahmanya

Department of Chemistry, Government College for Boys, Mahdya, Karnataka State.

Indian J. of Pharmaceutical Sciences, **43**, 2 (Jan-Feb 81)

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R. G. Bhatkar & D. C. Madkaiker

Goa College of Pharmacy, Panaji, Goa.

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Department of Animal Production Physiology, Haryana Agricultural University, Meerut-125 004.

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J. Garty, P. Sood & D. E. Rouins*

Division of Clinical Pharmacology, University of Utah College of Medicine, Salt Lake City UT 84132.

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A. V. Deshpande

Faculty of Pharmaceutical Sciences, Ahmadu Bello University, Zaria.

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A. E. Aboutaleb, F. S. Habib & M. A. Attia

Faculty of Pharmacy, University of Assiut, Assiut, Egypt.

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A. K. Malhotra & S. B. Jayaswal*

Department of Pharmaceutics, Institute of Technology, Banaras Hindu University, Varanasi-221 005.

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R. B. Patel, T. P. Gandhi, G. F. Shah, P. R. Patel, M. R. Patel, V. C. Patel & R. N. Gillert

R & D Cadila Laboratories, Ahmadabad-380 008.

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J. E. Roulston & G. A. MacGregor

Department of Medicine, Channing Cross Hospital Medical School, Fulham Palace Road, London W6 1RF.

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Shanghai Institute of Biochemistry, Chinese Academy of Sciences, 320 Yong Road, Shanghai 200031, China.

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E. J. Shellard

Department of Pharmacognosy, University of London, London.

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Chemistry Department, University College of Swansea, Singleton Park Swansea, SA 28PP.

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G. Merlin, M. Revel & D. Wallach*

Department of Virology, Weizmann Institute of Science, Rehovot, Israel.

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H. S. Gogate, S. P. Manek & H. P. Tiynis*

Bombay College of Pharmacy, Kelin, Bombay-400 028.

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I. W. Taylor, C. Ioannides, J. C. Turner, R. U. Koenigsberger, & D. V. Parke*

Department of Biochemistry, University of Surrey Guildford, Surrey.

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Y. K. Sikri & Jayaswal, S. B.*

Department of Pharmaceutics, Institute of Technology, Banaras Hindu University Varanasi-221 005.

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Department of Microbiology, Punjab University, Chandigarh, India.

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Centre de Recherches Roussel-Uclaf 10 Route de Noisy 93230 Romainville France.

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Division of Biochemistry and Biopharmaceutics, Institute of Research, Laboratories, Almirall, S. A. Cardoner 68-74, Barcelona 24, Spain.

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J. Sharples

Department of Pharmacy, University of Manchester, Manchester M139PL, UK.

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T. Sugimoto, J. Miyazaki, T. Kokubo, S. Tanimoto M. Okano & M. Matsumoto

Institute for Chemical Research, Kyoto-University, Uji, Kyoto 611 Japan.

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Department of Chemistry, University of Houston, Texas 77004, USA.

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Department of Nutrition and Food Science Massachusetts Institute of Technology, Cambridge, Massachusetts 02139.

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T. Nagatsu, T. Yamaguchi, T. Kato, T. Sugimoto, S. Matsuura, M. Akino S. Tsushima, N. Nakazawa & H. Ogawa

Laboratory of Cell Physiology, Department of Life Chemistry, Graduate School of Nagatsufa, Tokyo Institute of Technology, Yokohama 227, Japan.

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J. H. Collett, E. A. Tobin

Department of Pharmacy, University of Manchester, M139PL, UK.

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W. Durisch

Dr. W. Durisch, Eridg, Institut for Reaktorforschung, CH-5303 Wiirenlingen.

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G. P. Gibbs

Radioisotopes Division, MRC Clinical Research Centre, Walford Road, Harrow Middlesex.

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M. J. Saxena & S. B. Jayaswal*

Department of Pharmaceutics, Institute of Technology, Banaras Hindu University, Varanasi-221 005.

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Department of Food Science, Cook College, New Jersey Agricultural Experiment Station, Rutgers University, New Brunswick, New Jersey 08903.

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B. V. Fisher & P. B. Porter

Central Analytical Laboratories (Chemical), The Wellcome Foundation Limited, Temple Hill, Darlford, Kent DA 15 1UK.

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R. C. Pandey, K. L. Rinchart & D. Millington

Roger Adams Laboratory, University of Illinois, Urbana, IL 61801, USA.

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G. A. Somorjai

Materials and Molecular Research Division, Lawrence Berkeley Laboratory and Department of Chemistry, Berkeley CA 94720, USA.

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F. L. Moore

Department of Zoology, Oregon State University, Corvallis, Oregon 97331.

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Ghosh & A. Biswas

Iconate Ltd., 70-A Princep Street, Calcutta-700 072.

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H. Beastell, W. A. Ratelifee, M. Thomson & C. G. Semple

Department of Steroid Biochemistry and Medicine, Royle Infirmary, Glasgow-RSOF.

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C. E. Kendall, G. K. C. Low & D. M. Hailey*

National Biological Standards Laboratory, P. O. Box 462 Canberra City, A.C.T. 2601, Australia.

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C. A. Kennedy & B. V. McCleary*

Biological and Chemical Research Institute, N. S. W. Dept of Agriculture, P. M. B. 10, Rydalmere, 2116 N. S. W. Australia.

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Department of Pharmaceutics, Madurai Medical College, Madurai-625 020, India.

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K. P. Bhargava & N. Singh

Department of Pharmacology & Therapeutics, King George's Medical College, Lucknow-226 003.

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K. S. Mukherjee & S. Badruddoza

Department of Chemistry, Visva-Bharati Santiniketan, West Bengal.

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L. Prakash & G. Garg

Department of Chemistry, University of Rajasthan, Jaipur (Rajasthan) 302 004, India.

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R. K. Baslas & A. K. Singh

Research Laboratory, Department of Chemistry, Govt. Raza P. G. College, Rohilkhand University, Rampur-244 901.

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R. K. Baslas & P. Kumar

Research Laboratory, Department of Chemistry, Govt. Raza P. G. College, Rohilkhand University, Rampur-244 901.

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R. Tandon, G. K. Jain, R. Pal & N. Khanna*

Pharmaceutics Division, Central Drug Research Institute, Lucknow-226 001, India.

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G. Cooley, R. D. Farrant, D. N. Kirk* & S. Wynn

Medical Research Council Steroid Reference Collection, Chemistry Department, Westfield College, Hampstead, London NW37St.

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Department of Chemistry, Andhra University, Waltair-530 003.

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Department of Chemistry, University of Rajasthan, Jaipur.

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V. P. Singh, S. K. Sharma & V. S. Khare

School of Studies in Botany, Vikram University, Ujjain, India.

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B. Rao & G. V. S. Raju

Chemistry Department, Andhra University, Waltair-530 003.

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K. K. Purushothaman & S. Vasanth

Captain Srinivasa Murti Drug Research Institute (Ayurveda), Arumbakkam, Madras-600 029.

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A. Islam, R. K. Gupta & M. Krishnamurthi

Department of Chemistry, University of Delhi, Delhi-110 007.

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V. Asher, C. Becu, Mare J. O. Anteunis & R. Callens

Laboratory of Organic Chemistry, NMR Spectroscopic Unit, Rijksuniversiteit-Gent, Krijgslaan 271 (S4 Bis), B-9000 Gent, Belgium.

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National Chemical Laboratory, Poona-411 008.

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R. Balaraman & K. P. S. Raj

Pharmacy Department, M. S. University of Baroda, Baroda.

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J. Mukherjee & S. Biswas

Department of Biochemistry, Bose Institute, Calcutta-700 009.

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Department of Botany, University of Calcutta, Calcutta-700 019.

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A. G. R. Nair & R. Gunasegaran

Jawaharlal Institute, Pondicherry-605 006.

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CIMAP, Regional Centre, Pantnagar, Nainital, U. P., India.

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Department of Botany, Bose Institute, Calcutta-700 009.

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Department of Applied Chemistry, Yokohama National University, Tokiwadai, Hodogayaku, Yokohama 2 Japan.

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Roger L. Snowden

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School of Chemistry, University of Western Australia Nedlands, Western Australia 6009.

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Department of Chemistry, Baker Laboratory,
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Department of Chemistry, Besant Theological College,
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W. D. Carey†

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G. B. Kolata†

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I. Jern & Larsove Olsson

Swedyards Development Corp, Gothenburg,
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M. K. Rees†

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R. K. Singal

Chartered Engineer and Consultant
Sapta-Sindhu Enterprises, Bombay.*Indian and Pharmaceuticals Industry, 15, 2
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T. G. Krishnamurthy

24, Shanti Kuteer, Malleswaram, 15th
Cross, Bangalore.*Indian Drugs & Pharmaceuticals Industry
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†Address not available.

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Ghannoum, K. Morre & A. H. Walters*

Planning House, Sunningdole, Berks

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Lewin†

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S. Gutowsky

School of Chemical Sciences, University of Illinois, Urbana, Illinois 61801, USA.

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A. Stratton†

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M. Sun*

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C. Norman†

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E. J. Huth

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University of Basel, Institute of Organic Chemistry, CH-4056 Basel, Switzerland

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Department of Chemistry, University of Alberta, Edmonton, Alta, Canada T6G 2G2.

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Yale University, Department of Chemistry, New Haven, Connecticut 06520, USA.

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Lilly Research Laboratories, Division of Eli Lilly & Co., Indianapolis, IN 46285, USA.

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Institute of Virus Research, German Cancer Research Centre, Heidelberg, Federal Republic Germany.

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S. K. Ghai, A. Singh & M. S. Kalra*

Department of Microbiology, Punjab Agricultural University, Ludhiana 141 004, India.

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K. S. M. Sastry, S. Agrawal, R. Mani, valan, P. Singh & C. K. Atal

Regional Research Laboratory, Jamnagar Tawi-180 001, India.

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A. Austin and H Heath* III

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H. Oshima & P. Troen*

Department of Medicine, Montefiore,
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University of Dayton, Dayton, Ohio
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D. R. Abernethy & D. J. Greenblatt*

Division of Clinical Pharmacology, Box
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02111.

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D. Rouleau & N. Barden

Medical Research Council group in
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D. LeRoith, Y. Liel, M. Caine & I. M. Spitz*

Department of Endocrinology and Metabolism, Shaare Zedek Medical Center, P. O. Box 293, Jerusalem 91000, Israel.

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J. Hladovec

Institute for Clinical and Experimental Medicine, 11, NZ, Videnska 800, 14622 Praha 4, Krc (CSSR).

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W. B. Anderson & C. J. Jaworski

Laboratory of Pathophysiology, National Cancer Institute, National Institute of Health, Bethesda, Maryland 20205.

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J. M. Zanelli

National Institute for Biological Standards and Control, Holly Hill, Hampstead, London NW3 6RB (Great Britain).

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M. Centi, R. Gerenia, S. Adomo & Stefanini

Institute di Istologia ed Embriologia Generale, Universita di Roma Via Salaria 14, 00161 Roma, Italia.

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R. Kapp & J. L. Fox*

Department of Zoology, University of Texas at Austin, Texas 78712, USA.

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Medical Research Council of Canada Group in Reproductive Biology, Department of Obstetrics & Gynaecology and of Physiology, University of Western Ontario, University Hospital, London Ontario Canada N6A 5A5.

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K. J. Gaspard, H. M. Klitgaard & R. Wondergem

Department of Physiology, The Medical College of Wisconsin, 53226 Wisconsin.

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P. Pfeifer & G. Spitteller

Lehrstuhl für organische Chemie der Universität Bayreuth, Universitätsstrasse 30, D-8580 Bayreuth, GFR.

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K. Shimada, T. Tanaka & T. Nambora*

Pharmaceutical Institute, Tohoku University, Sendai, Japan.

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H. Suginome, H. Ono & T. Masamune

Organic Chemistry Laboratory, Department of Chemical Process Engineering, Faculty of Engineering, Hokkaido University, Sapporo, 060.

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L. Pannier & H. Rommelspacher

Institut für Neuropsychopharmakologie der Freien Universität Berlin, Ulmenallee 39 D-1000 Berlin 19, Federal Republic of Germany.

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T. E. Albertson, S. L. Peterson, L. G. Stark, M. L. Lakin & W. D. Winters

Department of Pharmacology, School of Medicine, University of California, Davis CA 95616, USA.

Neuropharmacology, **20**, 61 (Jan. 81).

R81B137. Cerebrovascular sympathetic denervation and blood brain barrier function in conscious rats.

J. E. Hardebo, L. Edvinsson & B. B. Johansson

Department of Histology and Neurology, University of Lund, and the Department of Neurology, University of Göteborg, Sweden.

Acta Physiologica Scandinavica, **110**, 375 (Dec. 80)

R81B138 Cholinergic muscarinic receptors in bovine adrenal cortex.

A. J. Hadjian, R. Ventre, & E. Chambaz

Biochimie Endocrinienne, Inserm, FR No 54 Université Scientifique et Médicale CERMU, 38041 Grenoble, France.

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G. S. Lazar & R. Carmel*

USC School of Medicine, 2025 Zou Ave, Los Angeles, California, 90033.

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G. B. Fregnan & R. Porta

Divisione Ricerche, Lusofarmaco S. P. A. Via Carnia 26, I-20132 Milano, Italy.

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C. Louis, B. Pattmann, J. Courageot, F. Rumigny, P. Mandel & M. Sensenbrenner

Unité 44 de l'INSERM, and Centre de Neurochimie du CNRS, 8 rue B Pascal, F-67084 Strasbourg cedex, France.

Experimental Brain Research, **42**, 63 (March, 81)

R81B142. The distribution of multiple opiate receptors in bovine brain.

M. Ninkovic, S. P. Hunt, P. C. Emson and L. L. Iversen

MRC Neurochemical Pharmacology Unit, Medical Research Council Centre, Medical School, Hills Road, Cambridge, U. K.

Brain Research, **214**, 163 (9 June, 81)

R81B143. The dynamic neck-eye reflex in mammals.

J. H. Fuller

Oral Anatomy College of Dentistry, University of Illinois Medical Centre, Chicago IL 60612, USA.

Experimental Brain Research, **41**, 29 (Dec. 80)

R81B144. The effects of cerebellar stimulation on alpha motoneuron excitability and the stretch reflex in the cat.

L. E. Morillo, T. J. Ebner & J. R. Bloedel

University of Minnesota, Departments of Neurosurgery, Neurology and Physiology, B 590 Mayo Memorial Bldg, 420 Delaware Street, S. E. Minneapolis, Minn 55455.

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R81B145. Effects of levo-alpha-acetylmethadol (LAAM) on morphine self-administration in the rat.

S. E. Lukas, J. E. Moreton* & N. Khazan

Department of Pharmacology and Toxicology, University of Maryland School of Pharmacy, 636 West Lombard Street, Baltimore, MD 21201 (USA).

Psychopharmacology, **73**, 12 (March II, 1981)

R81B146. The effects of neural stalk stimulation upon firing patterns in rat supraoptic neurones.

G. Leng

ARC Institute of Animal Physiology, Babraham, Cambridge CB2 4AT, England.

Experimental Brain Research, **41**, 135 (Jan. 81)

R81B147. The effects of opiate antagonists on food intake are stereospecific.

D. J. Sanger, P. S. McCarthy and G. Metcalf

Department of Pharmacology, Pharmaceutical Division, Reckitt and Colman, Dansom Lane, Hall H48 7DS, England.

Neuropharmacology, **20**, 45 (Jan. 81)

R81B148. Effects of pentazocine and nalorphine on motility in chronically morphine treated rats: a potential substitution test to detect the narcotic character of a drug.

M. Babbini, M. Gaiardi & M. Bartoletti
Institute of Pharmacology, University of Bologna, Italy.

Neuropharmacology, 20, 49 (Jan. 81)

R81B149. The effects of tryptamine on transmitter release at a lobster neuromolecular junction.

R. N. Friedman, R. P. Shank & A. R. Freeman*

Department of Physiology, Temple University School of Medicine, Philadelphia, Pa 19140, USA.

Brain Research, 214, 101 (9 June, 81)

R81B150. Effects of spinal cord transection on synapse numbers and biochemical maturation in rat lumbar sympathetic ganglia.

J. M. Lawrence, R. W. Hamill, P. Cochard, G. Raisman* & I. B. Black

Laboratory of Neurobiology, National Institute for Medical Research, Mill Hill, London NW7 1AA, U. K.

Brain Research, 212, 83 (11 May 81)

R81B151. Effects of Zimelidine on serotonergic and noradrenergic neurons after repeated administration in the rat.

S. B. Rose, H. Hall, A. L. Renyi & D. Westerlund

Research and Development Laboratory Astra Lakemedel ABS-15185, Sodertal Sweden.

Psychopharmacology, 72, 219 (March 81)

R81B152. Electroencephalographic findings during mantra meditation (Transcendental meditation). A controlled, quantitative study of experienced meditators.

B. Stigsby, J. C. Rodenberg & H. B. M
Department of Clinical Neurophysiology Gentofte Hospital, University of Copenhagen, DK 2900 Hellerup, Denmark.

Electroencephalography and Clinical Neurophysiology, 51, 434 (April 81)

R81B153. β -Endorphin-induced increases in plasma epinephrine, norepinephrine and dopamine in rats: inhibition of adrenomedullary response by intracerebral somatostatin.

G. R. VanLoon, N. M. Appel & D. Ho
Medical Science Building, Department of Medicine and Physiology, University of Toronto, Toronto Ont M5S 1A5 Canada.

Brain Research, 212, 207 (11 May 81)

R81B154. β -Endorphin-induced release of 5-hydroxytryptamine from human platelets.

L. H. Roll & G. G. Brune

Department of Neurology, University Minister, Roxeler Str. 131 D-4400 Munster, FRG.

Psychopharmacology, 73, 48 (March 11, 81)

R81B155. Endorphines: structure, synthesis and biogenesis.

Chretien, N. G. Seidah et H. Scherrer

Institut de Recherches Cliniques de Montreal
110 Oueat, avenue des Pins Mont-
real (Que), Canada H2W 1R7.

Canadian J. of Physiology & Pharmacology,
59, 413 (May, 81)

R81B156. Estimation of capillary permeability of insulin, sucrose and mannitol in rat brain cortex.

A. Amtorp

Institute of Medical Physiology, University
of Copenhagen, Denmark.

Acta Physiologica Scandinavica, **110**, 337
(Dec. 80)

R81B157. The functional importance of increased brain tryptophan in the serotonergic response to restraint stress.

G. A. Kennett & M. H. Joseph

Division of Psychiatry, MRC Clinical
Research Centre, Road Harrow Middlesex
HA1 3UJ, England.

Neuropharmacology, **20**, 39 (Jan 81)

R81B158. Glutamate, aspartate and GABA aminobutyrate transport by membrane vesicles prepared from rat brain.

R. Roskoski, Jr., N. Rauch & L. M.
Roskoski

Department of Biochemistry, Louisiana
State University Medical Center, New
Orleans, Louisiana 70112.

Archives of Biochemistry & Biophysics, **207**,
407 (April 81)

R81B159. Highly purified mitochondria from rat brain prepared by phase partition.

M. J. Lopez-perez, G. Paris & C. Larsson *

Department of Biochemistry, University
of Lund, P. O. Box 740, S 22007 Lund,
Sweden.

Biochemica et Biophysica Acta, **635**, 359 (13
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R81B160. Hippocampal function required for nonspatial working memory.

D. S. Olton & W. A. Feustle

Department of Psychology, The Johns
Hopkins University, Baltimore, M. D.
21218, USA.

Experimental Brain Research, **41**, 380 (Feb.
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R81B161. Imprinting an study of cholinergic receptor sites in parts of the chick brain.

P. Bradley & G. Horn*

University of Cambridge, Department of
Zoology, Downing Street, Cambridge
CB2 EJ, England.

Experimental Brain Research, **41**, 121
(Jan. 81)

R81B162. Imprinting: an electron microscopic study of chick hypertriatum ventricule.

P. Bradly, G. Horn* & P. Bateson

University of Cambridge, Department of Zoology, Downing street, Cambridge CB2 3EJ, England.

Experimental Brain Research, **41**, 115 (Jan. 81)

R81B163. Immunohistochemical localization of galactosyl and sulfolactosyl ceramide in the brain of the 30-day-old mouse.

B. Zaic, M. Monge, P. Dupouly, J. J. Hauw* & N. A. Baumann

Laboratoire de Neuropathologie Charles Foix, Hospital de La Solpatriere 47 Bd de L'Hopital 75651, Paris.

Brain Research, **211**, 341 (4 May 81)

R81B164. Injections of dopaminergic, cholinergic, serotonergic and gabaergic drugs into the nucleus accumbens: effects on locomotor activity in the rat.

D. L. Jones, G. J. Mogenson and M. Wu

Department of Physiology, Faculty of Medicine, University of Western Ontario, London, Ontario. Canada N6A 5C1.

Neuropharmacology, **20**, 29 (Jan. 81)

R81B165. Intracerebral substance P in mice: behavioral effects and narcotic agents.

N. N. Share & A. Rackham

Laboratories Merck Sharp and Doherty, Chibret, B. P. 88 Route de Marsat, 63000 Riom Cedex, France.

Brain Research, **211**, 379 (4 May 81)

R81B166. Intraspinal distribution and reaction in the grey matter with tetanus toxin of intracisternally injected antitetanus toxoid F(ab')₂ fragments.

G. Erdmann, A. Hanauske & H. H. W. Honer*

Department of Toxicology, Medizinische Hochschule Hannover, D-3000 Hannover (GFR).

Brain Research, **211**, 367 (4 May 81)

R81B167. In vitro antagonism of benzodiazepine binding to cerebral receptors by H₁ and H₂ antihistamines.

K. V. Specy Jr, S. Wang, G. R. Avramis, R. Parker & S. Schenker

V. A. Medical Center, 1310 24th Avenue, South Nashville, Tenn 37203.

J. of Laboratory Clinical Medicine, **97**, 1 (Jan 81)

R81B168. Is there a general anaesthesia receptor.

F. S. La Bella

Department of Pharmacology & Therapeutics, University of Manitoba Faculty of Medicine, Winnipeg, Man, Canada.

Canadian J. of Physiology & Pharmacology, **59**, 432 (May 81)

R81B169. Isolation of neurofilament proteins and of immunologically sensitive neurofilament degradation products from extracts of brain, spinal cord and sciatic nerve.

Sten-Olof Dahl

Department of Neuropathology, Harvard Medical School and Spinal Cord Injury Research, West Roxbury Veterans Administration Medical Center, Boston, MA 02132 (USA).

Biochemica et Biophysica Acta **668**, 299 (28 April 81)

R81B170. New aspects of the pathogenesis of atherosclerosis: possible approaches to prevention and treatment.

H. Gastpar

Department of Otorhinolaryngology, University of Munich Medical School, Munich, West Germany.

Current Medical Research & Opinion, **7**, No 3, 142 (1981)

R81B171. Occurrence of aminoacyl-tRNA synthetase complexes in calf brain.

M. Charezinski & T. Borkowski

Department of Physiological Chemistry, Medical School, Lubartowska 85, 20-123 Lublin, Poland.

Archives of Biochemistry & Biophysics, **207**, 241 (1 April 81)

R81B172. Observations on the use of anaesthetics in the preparation of *in vitro* CNS material.

J. Bagust & G. A. Kerkut

Department of Neurophysiology, Southampton University, Southampton, England.

Neuropharmacology, **20**, 73 (Jan 81)

R81B173. Opening of the blood brain barrier by acute elevation of intracarotid pressure.

J. E. Hardebo & B. Nillson

Department of Histology and Neurology and Laboratory for Experimental Brain Research, University of Lund, Sweden.

Acta Physiologica Scandinavica, **111**, 43 (Jan 81)

R81B174. Opiate like action of eseroline, an eserine derivative.

K. Jhamandas, J. Elliott & M. Sutak

Department of Pharmacology, Queen's University, Kingston Ont, Canada K7L 3N6.

Canadian J. of Physiology & Pharmacology, **59**, 307 (Mar 81)

R81B175. Pharmacological properties of 2, 3, 3a, 4, 5, 6-hexahydro-8-methyl-1H-pyrazino [3, 2, 1-j, k] carbazol hydrochloride (pirlindole), a new antidepressant.

M. D. Mashkovsky & N. I. Andrejeva

Laboratory of Pharmacology, All Union Chemical Pharmaceutical Research Institute, Zubov Skaja Str. 7 Moskau (USSR).

Anzneimittel Forschung/Drug Research, **31**, No. 1, 75 (1981)

R81B176. Pharmacology of 2-o-chlorobenzoyl-4 chloro-N-methyl-N²-glycylglycinanilide hydrate (45-0088-S a compound with benzodiazepine-like properties.

K. Hirose, A. Matsushita, M. Ecgyo, H. Jyoyama, A. Fujita, Y. Tsukinoki, T. Shiomi & K. Matsubara.

Shionogi Research Laboratory, Shionogi & Co., Ltd. Fukushima—Ku, Osaka 553, Japan.

Arzneimittel Forschung/Drug Research, **31**, No. 1,63 (1981)

R81B177. Physiologic mechanisms opposing the hemodynamic effects of prazosin.

J. L. Izzo, D. Horwitz* & H. R. Keiser

Hypertension-Endocrine Branch, National Heart, Lung, and Blood Institute, National Institute of Health, Bethesda, M. D. 20205.

Clinical Pharmacology and Therapeutics, **29**, 7 (Jan 81)

R81B178. The postexcitatory effects of acidic amino acids on spinal neurones.

H. McLennan & J Liu

Department of Physiology, University of British Columbia, Vancouver, BC Canada V6T 1W5.

Canadian J. of Physiology & Pharmacology, **59**, 239 (Mar 81)

R81B179. The postnatal development of somatosensory callosal connections after partial lesions of somatosensory areas.

R. Caminiti & G. M. Innocenti*

Institute of Anatomy, University Lausanne, Rue du bugnon a CH-10 Lausanne-Chuv, Switzerland.

Experimental Brain Research, **42**, (Mar 81)

R81B180. Pre- and postfunction effects of prostaglandin E₁ prostaglandin synthetase inhibitors and atropine on cholinergic neurotransmission in guinea pig ileum and bovine iris.

L. Gustafsson, P. Hedqvist & G. Lundgren

Department of Physiology and Department of Toxicology, Karolinska, Institute Stockholm, Sweden.

Acta Physiologica Scandinavica, **110**, 40 (Dec 80)

R81B181. Pressor responses and adrenomedullary catecholamine release during brain stimulation in the rat.

P. Gauthier

Centre de recherche en Sciences neurologiques, Department de physiologie Faculte de medecine Universite de Montreal, Montreal (Que) Canada H3C 3T8.

Canadian J. of Physiology & Pharmacology, **59**, 485 (May, 81)

R81B182. Properties of mesencephalic reticulospinal neurons in the rat.

. Fukushima, S. Murakami, M. Ohno
M. Kato

Department of Physiology, Hokkaido University, School of Medicine, Sapporo 060, Japan.

Experimental Brain Research, **41**, 75 (Dec. 80)

R81B183. Prophylaktische und therapeutische Anwendung von anti-cholesterin untersucht am Carra-geninpfoten-odem der ratte.

Von K. Militzer und H. Hirche

Zentrales Tienlaboratorium fur Experimentelle Medizin am Univesitsklinikum, Hufelandstra Be 55, 4300 Essen.

Arzneimittel Forschung/Drug Research, **31**, No. 1, 26 (1981)

R81B184. Receptor for protons in the membrane of sensory neurone.

O. A. Krishtal & V. I. Pidoplichko

AA Bogomotetz Institute of Physiology, Academy of Sciences of the Ukrainian SSR, Kiev 24, 252601 GSP, USSR.

Brain Research, **214**, 150 (9 June, 81).

R81B185. Regional distribution of ascorbate in human brain.

I. N. Mefford, A. F. Oke & R. N. Adams.

Department of Chemistry, University of Kansas, Lawrence, Kans, 66045, USA.

Brain Research, **212**, 223 (11 May, 81)

R81B186. Selective protection of methionine enkephalin released from brain slices by enkephalinase inhibition.

G. Patey, S. De La Baume, J. C. Schwartz, C. Gross, B. Roques, M. C. F. Zaluski & E. S. Lucas,

Unite de Neurobiologie, Centre Paul Broca de I. I. N. S. E. R. M., 75014 Paris, France.

Science, **212**, 1153 (5 June, 81)

R81B187. A simple, inexpensive filtration device suitable for neurotransmitter receptor binding studies in brain tissue.

M. Wilkinsen & D. Grovestine

Department of Physiology & Biophysics, Faculty of Medicine, Dalhousie University, Halifax, N. S. Canada B3H 4H7.

Canadian J. Physiology & Pharmacology, **59**, 504 (May, 81)

R81B188. Somatostatin-28, somatostatin-14 and somatostatin analogue: effects on thermoregulation.

M. Brown, N. Ling & J. Rivier

Peptide Biology Laboratory, P. O. Box 85800, San Diego Calif, 92138, U.S.A.

Brain Research, **214**, 127 (9 June, 81)

R81B189. Studies on the endoanesthetic effects of lidocaine and benzonatate on non-medullated nerve endings in the left ventricle.

P. Thoren & B. Oberg

Department of Physiology, University of Goteborg, Sweden.

Acta Physiologica Sciandnavica, **111**, 51 (Jan. 81)

R81B190. Studies on modulation of transmitter release effector responsiveness in autonomic cholinergic neurotransmission.

L. E. Gustafsson

Department of Physiology, 1, Karolinska Institute S-10401, Stockholm, Sweden.

Acta Physiologica Scandinavica, Suppl. No 489, (1980)

R81B191. Topographical localization of choline acetyltransferase within the human spinal cord and a comparison with some other species.

S. Aquilonius, S. Eckernas & P. Gillberg

Department of Neurology, University Hospital, S. 75014 Uppsala Sweden.

Brain Research, 21, 329 (4 May, 81)

R81B192. Vasopressin stimulates release of β -lipotropin and β -endorphin in conscious rats as measured by radioimmunoassay of unextracted plasma.

H. Anhut, W. Knepel, D. Nutto & C. Hertting

Pharmakologisches Institute der Universität Freiburg, Hermann-Herder-strasse 5, D 7800 Freiburg i. Br. F. R. G.

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C CARDIOVASCULAR SYSTEM

R81C113. Asymptomatic myocardial ischemia.

A. S. Iskandrian, B. L. Sengal & G. S. Anderson

Hahnemann Medical College & Hospital
230N Broad St. Philadelphia, PA 19102
Dr. Iskandrian.

Archives of Internal Medicine, 141, 95 (Jan. 81)

R81C114. Cardiac effects of prostaglandins E_1 and $E_1\alpha$.

R. V. S. V. Vadlamudi and J. H. McNeill

Division of Pharmacology & Toxicology, Faculty of Pharmaceutical Sciences, University of British Columbia, Vancouver B. C. V6T 1W5, Canada.

Canadian J. of Physiology & Pharmacology, 59, 473 (May, 81)

R81C815. Cardiovascular changes during the calcium carbimide-ethanol interaction.

J. E. Peachey, S. Maglana, G. M. Robinson, M. Hemy & J. F. Brien

Clinical Institute, Addiction Research Foundation, 33 Russell St. Toronto, Canada M5S2S1.

Clinical Pharmacology and Therapeutics, 30, 40 (Jan. 81)

R81C116. Characterization of a new potent heparin. 6th communication: The comparison of the anticoagulant effect of the sodium & calcium salts of a new potent heparin after SC injection in beagle dogs.

J. S. Bhargava, C. Schobel and P. Kunzel

Research Laboratories, Schering AG, Mullerstra Be 170-178 Berlin 65, Germany.

Arzneimittel Forschung/Drug Research, **31**, No. 1, 79 (1981).

R81C117. Diet and coronary heart disease.

M. F. Oliver

Department of Cardiology & Medicine, University of Edinburgh, Edinburgh.

British Medical Bulletin, **37**, 49 (Jan. 81)

R81C118. Digitalis in cardiac failure.

A. Selzer

Division of Cardiology, Presbyterian Hospital of Pacific Medical Center P. O. Box 7999, San Francisco, CA94120.

Archives of Internal Medicine, **141**, 18 (Jan. 81)

R81C119. Digitalis update.

W. Shapiro (Editorial)

Cardiovascular Section, 111A Veterans Administration Medical Center, 4500 Lancaster Rd. Dallas, TX 75216.

Archives of Internal Medicine, **141**, 17 (Jan. 81)

R81C120. Electrocardiogram in the aged: An independent marker of heart disease?

Charles Fisch

Department of Medicine, University Hospital W 485, 1100 West Michigan Street Indianapolis IN 46223.

American J. of Medicine, **70**, 4 (Jan. 81)

R81C121. Review: Embryonic hemoglobins in man and other mammals.

A. Fantoni, M. C. Farance and R. Gambari

Laboratorio di Biofisica SSN Casaccia, CNEN Roma, Italia.

Blood, **57**, 623 (April, 81)

R81C122. Explanted cardiac cells: a model to study drug actions?

O. F. Schanne and G. Bkaily

Department of Biophysics, Faculty of Medicine, University of Sherbrooke P.O. Canada J1H 5N4.

Canadian J. of Physiology & Pharmacology, **59**, 443 (May, 81).

R81G123. GABAergic mechanisms in blood pressure control. A pharmacological analysis in the rat.

B. Persson

Department of Pharmacology, University of Goteborg, Sweden.

Acta Physiologica Scandinavica, Suppl. No. **491**, (1980).

R81C124. Obesity and essential hypertension.

F. H. Messerli, B. C. Jose, G. R. De-Carvalho, G. G. Aristimuno, D. H. Suarls, G. R. Dreslinski & E. D. Frohlich

Ochsner Clinic, 1514 Jefferson Hwy, New Orleans LA 70121.

Archives of Internal Medicine, **141**, 81 (Jan. 81)

R81C125. Respiratory and cardiovascular responses to temperature changes in the perfused pulmonary arteries of the dog.

J. R. Ledsome, W. O. Kan & C. P. Bolter

Department of Physiology, University of British Columbia, Vancouver, BC Canada V6T 1W5.

Canadian J. of Physiology & Pharmacology, **59**, 493 (May, 81)

R81C126. The reversible binding of vinblastine to platelets: implications for therapy.

J. K. Kelton, J. W. D. McDonald, R. M. Barr, I. Walker, W. Nicholson, P. B. Neame, C. Hamid, T. Y. Wong and J. Hirsh.

Room 2N34, Department of Pathology, McMaster University Medical Centre, 1200 Main Street, West Hamilton, Ontario L8S439, Canada.

Blood, **57**, 431 (March, 81)

R81C127. Serotonergic and noradrenergic mechanisms involved in the cardiovascular effects of angiotensin II injected into the anterior hypothalamic preoptic region of rats.

E. E. Benarroch, C. J. Pirola, A. Alvarez and V. E. Nahmon

Laboratorio de Sustancias Vasoactivas, Instituto de Buenos Aires Donato Alvarez 3150, 1427 Buenos Aires, Argentina.

Neuropharmacology, **20**, 9 (Jan. 81)

R81C128. Synthesis and biological properties of [ASN¹, aza-Hva³]-angiotensin and [ASN¹, aza-Hva³, Ile⁸] angiotensin.

J. Ancans, N. A. Makarova, and C. Chipens

Institute of Organic Synthesis, Academy of Sciences of the Latvia S. S. R. Riga.

Bio-organic Chemistry, **7**, No. 3, 336 (1981)

R81C129. Synthesis of a cyclic analog of angiotensin modified in position 1 & 5.

R. E. Vegner, G. I. Chipens, I. V. Grinshchik, N. V. Myshlyakova, G. A. Afanasieva and I. A. Vosekalna

Institute of Organic Synthesis, Academy of Sciences of the Latvian S. S. R. Riga.

Bio-organic Chemistry, **7**, No. 3, 325 (1981)

01C130. Untersuchungen zur Wirkung von Nikotin auf hemodynamik und sauerstoffverbrauch des herzens nach akuter und chronischer sympathikolyse und nach atropin.

Von H. Gulker und H. Heuer

Medizinische Universitätsklinik, Abteilung Innere Medizin C, Westring 3, 4400 Münster.

Anzeimittel Forschung/Drug Research, **31**, No. 1, 48, (1981)

RESPIRATORY SYSTEM

R81D121. Assessment of bronchial beta blockade after oral bevantolol.

A. D. Mackay, H. R. Gribbin, C. J. Baldwin & A. E. Tattersfield

Department of Respiratory Physiology, City General Hospital, Newcastle Road, Stoke-on-Trent, Staffordshire, United Kingdom.

Clinical Pharmacology and Therapeutics, **29**, 1 (Jan. 81)

R81D122. Pharmakologische untersuchungen zur broncholytischen und sekretolytisch expektorierenden wirksamkeit einer salbe auf basis von menthol, compher und atherischen olen.

Von D. Schafer und W. Schafer

Chemisches Institut Schafer AG, Sagesstrasse 5, CH 4104 Oberwil BL (Schweiz).

Arzneimittel Forschung/Drug Research, **31**, No. 1, 82 (1981)

E GASTROINTESTINAL DISORDERS

R81E040. Body fluid homeostasis in man. A contemporary overview.

K. L. Skorecki & B. M. Brenner*

Renal Division, Brigham and Womens Hospital, 75, Francis St. Boston, MA 02115.

American J. of Medicine, **70**, 77 (Jan. 81).

R81E041. Gastric inhibitory polypeptide stimulated secretion of somatostatin like immunoreactivity from the stomach: inhibition by acetylcholine or vagal stimulation.

C. H. S. Mcintosh, R. A. Pederson, H. Koop & J. C. Brown

Department of Physiology. University of British Columbia, Vancouver, B. C. Canada V6T 1W5.

Canadian J. Physiology and Pharmacology, **59**, 468 (May 81).

R81E042. Renal response to isotonic volume expansion in the developing rat.

G. Elinder

Department of Pediatrics, Karolinska Institute, St. Goran's Children's Hospital, Stockholm, Sweden.

Acta Physiologica Scandinavica, Suppl. No. **490** (1980).

R81E043. Stimulation of gastric acid bicarbonate secretions by calcium in guinea pig stomach and amphibian isolated mucosa.

G. Flemstrom & A. Garner

Department of Physiology and Medical Biophysics, University of Uppsala Medical Center, Sweden.

Acta Physiologica Scandinavica, **110**, 41 (Dec. 80).

F METABOLIC AND DEGENERATIVE DISORDERS

R81F156. Actions pattern of human pancreatic α amylase on maltoheptaose, a substrate for determining α -amylase in serum.

E. O. Haegele*, E. Schaich, E. Rauscher, P. Lehmann & M. Grasse

Boehringer Mannheim GmbH. Biochemica Werk Tutzing, D. 8132, Tutzing/Obb, GFR.

J. of Chromatography (Biomedical Applications), **233**, 69 (10 April 81).

R81F157. Associations of serum high density lipoprotein and total cholesterol with total cardiovascular and cancer mortality in a 7-year prospective study of 10,000 men.

S. Yaari, U. Goldoburt*, S.E. Zohar & H. N. Neufeld

Heart Institute, Chaim Sheba Medical Centre, Tel Hashomer 52621, Israel.

Lancet, **I**, 1011, (9 May 81).

R81F158. Changes in liver cell plasma membrane polypeptides of phalloidin treated rats with special reference to the actomyosin complex.

B. Tuchweber, R. T. Vonk & I. M. Yousef*

Centre de Recherche, Hospital Sainte-Justine, 3175 Chemin Sainte-Catherine, Montreal, Quebec, Canada H3T 1C5.

Canadian J. of Biochemistry, **59**, 165 (March 81).

R81F159. Clinical aspects of drug usage: 14 diabetes mellitus.

I. W. Campbell

Department of Medicine, University of Edinburgh, Edinburgh.

Pharmaceutical J., **226**, 382 (11 April 81).

R81F160. Contractility of bile canaliculi: Implications for liver function.

C. Oshio & M. J. Phillips*

Research Institute and Department of Pathology, Hospital for Sick Children and Department of Pathology, University of Toronto, Toronto, Ontario, Canada M5C 1X8.

Science, **212**, 1041 (29 May 81).

R81F161. Control of fat cell phosphatidate phosphohydrolase by lipolytic agents.

F. Moller, K. H. Wong & P. Green

Department of Biochemistry, Queen's University, Kingston, Ontario, Canada K7L 3N6.

Canadian J. of Biochemistry, **59**, 9 (Jan. 81).

R81F162. Dietary fibers VI: binding of fatty acids and monolein from mixed micelles containing bile salts and lecithin (41616).

G. V. Vahoumy, R. Tombes, M. M. Cassidy, D. Kritchevsky and L. L. Gallo

Department of Biochemistry, The George Washington University School of Medicine and Health Services, Washington D. C. 20037.

Proceedings of the Soc. for Experimental Biology & Medicine, **166**, 12 (Jan. 81).

R81F163. Defferential time course of glucagon's effect on glycogenolysis and gluconeogenesis in the conscious dog.

A. D. Cherrington, P. E. Williams, G. I. Shulman & W. W. Lacy

Department of Physiology, Vanderbilt, University School of Medicine, Nashville, Tennessee 37232.

Diabetes, **30**, 180 (March 81).

R81F164. The effect of glucagon, dibutyrylic cyclic AMP and insulin on bile production in the intact rat and the perfused rat liver.

O. Thomsen & J. A. Larsen

Institute of Physiology, University of Aarhus, D. K. 8000 Aarhus C, Denmark.

Acta Physiologica Scandinavica, **111**, 23 (Jan. 81).

R81F165. Effect of insulin and glucose infusions on sympathetic nervous system activity in normal man.

J. W. Rowe, J. B. Young, M. L. Minaker A. L. Stevens, J. Pallotta & L. Landsberg

Department of Medicine, Beth Israel Hospital 330 Brookline Avenue, Boston Massachusetts 02215.

Diabetes, **30**, 219 (March 81).

R81F166. The effect of physical trouning on insulin secretion of rat pancreatic islets.

H. Galbo, C. J. Hedekov, K. Capito & J. Vinten

Department of Medical Physiology B and Department of Biochemistry A, Panum Institute, University of Copenhagen, Denmark.

Acta Physiologica Scandnaivica, **111**, 75 (Jan 81).

R81F167. Effect of pH on pyrazole binding to liver dehydrogenase.

P. Andersson, J. Kvassman, A. Lindstrom B. Olden & G. Pettersson

Avdelningen for Biokemi, Kemicentrum, Lunds Universitet, Box 740, S 22007 Lund, Sweden.

European J. of Biochemistry, **114**, 549 (1 March 81).

R81F168. Effect of cholesterol on the properties of the membranes of isolated sheep liver nuclei and nuclear envelopes.

P. S. Agutter & K. E. Suckling

Department Biological Sciences, Napier College, Colinton Road, Edinburgh EH 105 DT, UK.

Biochemica et Biophysica Acta, **643**, 182 (22 April 81).

R81F169. Effects of phenobarbital upon triacylglycerol metabolism in the guinea pig.

D. M. Goldberg, A. Yu, M. W. Roomi & D. A. K. Roncari

The Department of Clinical Biochemistry, The University of Toronto, Toronto, Ontario, Canada M5T 2S8.

Canadian J. of Biochemistry, **59**, 48 (Jan. 81).

R81F170. Evidence for a direct interaction of L-ascorbate with rat liver DNA.

M. Jamaluddin, S. Rajalakshmi & D.S.R. Sarma

Department of Pathology, University of Toronto Medical Sciences Building, Toronto, Ontario, M5S 1A5, Canada.

Biochemica et Biophysica Acta, **653**, 423 (29 May 81).

R81F171. Factors affecting the initial rate of lipoxygenase catalysis.

M. O. Funk, S. H. S. Kim & A. W. Altenecker

Department of Chemistry, Bowman Laboratories, University of Toledo, Toledo, Ohio 43606.

Biochemical and Biophysical Research Communications, **98**, 922 (27 Feb. 81).

R81F172. Foreword diabetes mellitus. Progress and directions.

J. S. Skyler & G. F. Cahill

Diabetes/Endocrinology Unit, University of Miami Hospital and Clinics, 1601 N. W. 12 Avenue, Miami, Florida 33136.

American J. of Medicine, **70**, 101 (Jan. 81).

R81F173. Glucocorticoid hormone receptors in rat pancreas.

F. Svec & Rudis

Section of Endocrinology, Department of Medicine, Louisiana State University Medical Center, New Orleans LA 70112, USA.

Biochemica et Biophysica Acta, **674**, 30 (April 81).

R81F174. Glucose counterregulation in man.

P. E. Cryer

Metabolism Division, Department of Medicine, Washington University School of Medicine, 6605 Euclid Avenue, St. Louis Missouri 63110.

Diabetes, **30**, 261 (March 81).

R81F175. Glucose reabsorption in the kidney.

Silverman

Department of Medicine, University of Toronto, Toronto, Ontario Canada M5S1A8.

Canadian J. Physiology & Pharmacology, **59**, 9 (March 81).

R81F176. Increased platelet thromboxane synthesis in diabetes mellitus.

V. Halushka, R. C. Rogers, C. B. Goodnight & J. A. Colwell

Department of Pharmacology, Medical University of South Carolina, Charleston SC 29403.

Journal of Laboratory and Clinical Medicine, **97**, 7 (Jan. 81).

R81F177. Induction of DNA ligase during stimulation of DNA synthesis in intact rat liver by a dietary manipulation.

H. Teraoka, K. Okamoto, S. Tamura & K. Tsukada

Department of Pathological Biochemistry Medical Research Institute, Tokyo Medical and Dental University, Kanda-surugadai, Chiyoda-ku, Tokyo 101, Japan.

Biochemica et Biophysica Acta, **653**, 408 (29 May 81).

R81F178. The insulin gene is located on the short arm of chromosome in humans.

D. Owerbach, G. I. Bell, W. J. Rutter,* J. A. Brown & T. B. Shows

Department of Biochemistry and Biophysics, University of California, School of Medicine, San Francisco, California, 94143.

Diabetes, **30**, 267 (March 81).

R81F179. The molecular organisation of biomolecular lipid membranes. The dielectric structure of the hydrophilic/hydrophobic interface.

R. G. Asheroft, H. G. L. Coster & J. R. Smith

Biophysics Laboratory, School of Physics, The University of New South Wales, Sydney, N. S. W. 2033 Australia.

Biochemica et Biophysica Acta, **643**, 191 (22 April 81).

R81F180. Nervous control of pancreatic endocrine secretion in pigs. I. Insulin and glucagon responses to electrical stimulation of the vagus nerves.

J. J. Holst, R. Gronholt, B. O. Schaffalitzky de Muckadell & J. Fahrenkrug.

Institute of Medical Physiology C, University of Copenhagen and the Department of Clinical Chemistry, Bispebjerg Hospital, Copenhagen, Denmark.

Acta Physiologica Scandinavica, **111**, 1 (Jan. 81).

R81F181. Nervous control of pancreatic endocrine secretion in pigs. II. The effect of pharmacological blocking agents on the response to vagal stimulation.

J. J. Holst R. Gronholt, O. B. Schaffalitzky de Muckadell & J. Fahrenkrug.

Institute of Medical Physiology C, University of Copenhagen and the Department of Clinical Chemistry, Bispebjerg Hospital, Copenhagen, Denmark.

Acta Physiologica Scandinavica, **111**, 9 (Jan 81).

R81F182. Nervous control of pancreatic endocrine secretion in pigs. III. The effects of acetylcholine on the pancreatic secretion of insulin and glucagon.

J. J. Holst, O. B. Schaffalitzky de Muckadell, J. Fahrenkrug, S. Lindkear, O. V. Nielsen & T. W. Schwartz

Institute of Medical Physiology C, University of Copenhagen, Department of Clinical Chemistry, Bispebjerg Hospital, Copenhagen, Denmark.

Acta Physiologica Scandinavica, **111**, 15 (Jan. 81).

R81F183. Net uptake of adenine nucleotides by newborn rat liver mitochondria.

J. R. Aprille

Department of Biology, Tufts University, Medford, Massachusetts 02155.

Archives of Biochemistry & Biophysics, **207**, 157 (March 81).

R81F184. Non-steroidal anti-inflammatory drugs and the sigma SR in rheumatic diseases.

A. Saunders, J. Kerkham, H. A. Birrell & V. Wright

Clinical Pharmacology Unit Royal Brompton Hospital, Harrogate and Rheumatology Research Unit, University Department of Medicine, General Infirmary, Leeds, England.

Current Medical Research & Opinion, **7**, 192 (1981).

R81F185. Serum cholesterol and triglyceride levels in school-age population.

S. Munoz, H. Munoz, F. Zambrano & N. Gueron

Hospital Universitario de Caracas, Servicio de Cardiologia, Ciudad Universitaria, Caracas, Venezuela.

Archives of Internal Medicine, **141**, 24 (Jan 81).

R81F186. The similarity of histone from turtle erythrocytes and liver.

R. G. Rutledge, C. E. Shay, G. L. Brown & J. M. Neelin

Institute of Biochemistry and Biology Department, Carleton University Ottawa, Ontario Canada K1S 5B6.

Canadian J. of Biochemistry, **59**, 273 (April 81).

R81F187. Site of synthesis of metallothionin in rat liver.

G. Cherian, S. Yu & C. M. Redman

Department of Pathology, University of Western Ontario, Canada N6A 5C1.

Canadian J. of Biochemistry, **59**, 301 (April 81).

R81F188. Structural characterization of polysomal poly(A)-protein particles in rat liver.

J. Tomesanyi, L. Komaromy & A. Tigyi

Biologiai Intezet, Pecs Orvostud-Omanyi Egyetem, Szigeti ut 12, H-7624 Pecs, Hungary.

European J. of Biochemistry, **114**, 421 (Feb. 11) 81).

R81F189. Substrate requirements for the phosphoinositide response in rat pancreatic islets.

R. S. Clements, Jr., M. H. Evans & C. S. Pace

Veterans Administration Medical Center, 700 South 19th Street, Birmingham, AL 35233 USA.

Biochemica et Biophysica Acta, **674**, 1 (17 April 81).

R81F190. Tissue differences in insulin receptors acute change in insulin binding characteristics induced by wheat germ agglutinin.

L. A. Pittick, R. T. Moxley III & J. N. Livingston*

Endocrine metabolism Unit, Department of Medicine, University of Rochester, School of Medicine and Dentistry, Rochester, New York 14642.

Diabetes, **30**, 196 (March 81).

R81F191. Transfer of glucose in the biosynthesis of thyroid glycoproteins. I. Inhibition of glucose transfer to oligosaccharide lipids by GDP—mannose.

C. Ronin, C. Caseti & S. Bouchillous

Laboratoire de Biochimie Medicale et 438 INSERM Faculte de Medicine, Bd J Moulin 13385 Marseills Cedex 4, France.

Biochemica et Biophysica Acta, **674**, 48 (17 April 81).

R81F192. Transfer of glucose in the biosynthesis of thyroid glycoprotein. II. Possibility of a direct transfer of glucose from UDP-glucose to proteins.

C. Ronin & C. Caseti

Laboratoire de Biochimie, Medicale et 438 Inserm, Faculte de Medicine, Bd J. Moulin, 13385 Marseille, Cedex 4, France.

Biochemica et Biophysica Acta, **674**, 58 (17 April 81).

R81F193. Transport of inorganic anions in perfused rat liver.

A. Bracht, A. Kelmer Bracht, A. J. Schwab & R. Scholz

Universidade Estadual de Maringa, Departamento de Farmacia e Bioquimica Avenida Colombo 3690, 87100 Maringha, Estado do Parana, Brasil.

European J. of Biochemistry, **114**, 471 (1 March 81).

R81F194. Uptake of glucose into the intestine of diabetic rats. Effects of variations in the effective resistance of the unstirred water layer.

A. B. R. Thomson

8-104 Clinical Sciences Building,
University of Alberta Edmonton, Canada
T6G 2G3.

Diabetes, 30, 247 (March 81).

R81F195. Uric acid-induced decrease in rat insulin secretion.

F. W. Scott, K. D. Trick, B. Stavric, J. Braaten & Y. Siddiqui

Nutrition and Toxicology Research Division, Food Directorate, Health Protection Branch, Deptt. of National Health and Welfare, Ottawa, Ontario K1A 0L2.

Proceeding of the Soc. Experimental Biology and Medicine, 166, 123 (Jan. 81).

G INFECTIOUS DISEASES

Viral

R81G093. Mechanism of action of antiviral hetarylhydrazones *in vitro*,

M. Tonew

Central Institute of Microbiology and Experimental Therapy, Research Centre for Molecular Biology and Medicine Academy of Sciences of the German Democratic Republic, 69 Jena, German Democratic Republic.

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Bacterial

R81G094. A comparison of cefamandole, cefoxitin, cefuroxime, cefotaxime and cefoperazone: an *in vitro* test on a number of beta-lactamase producing strains of 9 species and 1 genus of bacteria.

J. S. Kuipers

Van Veldekelaan 29, 9752 EK Haren Gn, The Netherlands.

Current Medical Research & Opinion, 7, No. 3, 196 (1981)

R81G095. Energy coupling mechanisms in host-grown *Mycobacterium lepraemurium*.

M. Ishaque, C. Adapoe & L. Kato

Pavillon Hansen, Centre de Recherche Bacteriologie, Institut Armand-Frappier, Universite du quebec, Laval-des-Rapides, Que, Canada H 7N4Z3.

Canadian J. of Biochemistry, 59, 75 (Jan. 81)

R81G096. Location of *o*-acetyl groups in bacterial polysaccharides.

Yu A. Knirel, E. V. Vinogradov, B. Dmitriev & N. K. Kochetkov

N. D. Zelinsky Institute of Organic Chemistry, Academy of Sciences of the USSR, Moscow.

Bio-organic Chemistry, 7, No. 3, 463 (1981)

R81G097. Motility and chemotaxis of three strains of *Pseudomonas aeruginosa* used for virulence studies.

C. Craven & T. C. Montie*

Department of Microbiology, University of Tennessee, Knoxville, T. N. USA, 37916.

Canadian J. of Microbiology, **27**, 458 (April, 1981)

R81G098. A new staphylococcal enterotoxin, enterotoxin F, associated with toxic-shock-syndrome *Staphylococcus aureus* isolates.

I. S. Bergdoll, B. A. Crass, R. F. Reiser, J. N. Robbins & J. P. Davis

Food Research Institute, University of Wisconsin, 1925 Willow Drive Madison, Wisconsin 53706, USA.

Lancet, **1**, 1017 (9 May, 81)

R81G099. Solitary pulmonary nodules due to non-tuberculous mycobacterial infection.

A. R. Gribetz, B. Damsker, E. J. Bottone, P. A. Kirschner & A. S. Teirstein

The Mount Sinai Medical Center, One Gustave L Levy Place, New York NY 10029.

American J. of Medicine, **70**, 39 (Jan. 1981)

Parasitic

R81G100. Amebiasis.

D. J. Krogstad, G. L. Melson and G. R. Healy

Washington University School of Medicine, 6605, Euclid Ave St. Louis, MO 63110.

Archives of Internal Medicine, **141**, 20 (Jan. 1981)

R81G101. Cultivation in vitro of the vivax type malaria parasite *Plasmodium cynomolgi*.

P. N. Dinh, A. L. Gardner, C. C. Campbell, J. C. Skinner & W. E. Collins

Vector Biology and Central Division, Center for Infectious Diseases, Center for Diseases Control, Atlanta, Georgia.

Science, **212**, 1146 (5th June, 81)

R81G102. Ethanolamine kinase from *Culex pipiens fatigans*.

P. Ramabrahmam & D. Subrahmanyan*

Ciba-Geigy Research Centre, Goregaon, Bombay-400 063, India.

Archives of Biochemistry & Biophysics, **207**, 55 (March 81)

R81G103. Potentiating action of rifampicin and isoniazid against *Leishmania mexicana amazonensis*.

W. Peters, R. Lainson, J. J. Shaw, B. L. Robinson & A. F. Leao

Department of Medical Protozoology, London School of Hygiene and Tropical Medicine, Keppel Street, London, WC1E 7HT, England.

Lancet, **1**, 1122 (23 May 81)

R81G104. Resistance of *Plasmodium falciparum* malaria to sulfadoxine pyrimethamine (Fansidar) in a refugee camp in Thailand.

E.S. Hurwitz, D. Johnson & C.C. Campbell

Viral Disease Division, Center for Infectious Diseases, Center for Disease control, Atlanta, Georgia 30333, USA.

The Lancet, **1**, 1068 (16 May 81)

R81G105. Transbilayer phospholipid asymmetry in *plasmodium knowlesi* infected host cell membrane.

C. M. Gupta & G. C. Mishra

Division of Biophysics, Central Drug Research Institute, Lucknow.

Science, **212**, 1047 (29 May 81)

R81G106. Treatment of an amebic liver abscess with intravenous metronidazole.

T. Kovaleski, M. A. Malangoni & L. J. Wheat

Wishard Memorial Hospital OP 310 10 W 10th St. Indianapolis, IN 46202.

Archives of Internal Medicine, **141**, 132 (J 81)

R81G107. Cloning of naturally occurring mixed infections of malaria parasites.

V. Rosario

Institute of Animal Genetics, West Main Road, Edinburgh EH93JN, Scotland.

Science, **212**, 1037 (29 May 81)

R81G108. New chemotherapeutic nitroheterocycles active against nitroimidazole-resistant strains trichomonads.

J. G. Meigassner, H. Nesvadba & Mieth

Sandoz Forschungsinstitut, Brunnerstrasse 59, A-1235 Vienna, Austria.

Arzneimittel Forschung/Drug Research, **31**, No. 1, 6 (1981)

H ANTINEOPLASTIC AGENTS

R81H033. Anti-mitogenic function of interferon-induced (2'-5') oligo (adenylate) and growth-related variations in enzymes that synthesise and degrade this oligonucleotide.

A. Kimchi, H. Shure & M. Revel

Department of Virology, Weizman Institute of Science, Rehovot, P. O. Box 26, IL 76-100 Israel.

European J. of Biochemistry, **114**, 5 (1 Feb. 81)

R81H034. Application of human leukocyte interferon in patients with carcinoma of the uterine cervix.

D. Ilic, J. Krusic, V. Kirchmajer, M. Knerzevic, Z. Maricic, B. Rode, D. Juric & E. Soos

Institute of Immunology, Zagreb and Dr Mladen Stojanovic University Hospital, Zagreb, Yugoslavia.

Lancet, **1**, 1027 (9 May 81)

H035. Application of human leucocyte interferon in patients with tumours of the head and neck.

Ikic, I. Padovan, I. Brodarec, M. Knezevic & E. Soos

Institute of Immunology, Zagreb, and Mladen Stojanovic University Hospital, Zagreb, Yugoslavia.

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Institute of Immunology, Zagreb, Central Institute of Tumours and Allied Diseases, Zagreb, and Institute of Pathology, Dr. Mladen Stojanovic University Hospital, Zagreb, Yugoslavia.

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W. J. Dunn III & S. Wold

Department of Medicinal Chemistry, College of Pharmacy, University of Illinois at the Medical Center, 833 S. Wood Chicago, Illinois 60612.

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J. Hermann & B. Keil

Unité de Chimie des protéines, Département de Biochimie et Génétique Moléculaire, Institut Pasteur, 28 rue de Dr. Roux 75724 Paris, Cedex 15 (France).

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Cytogenetics Unit, Christchurch Hospital, Christchurch, New Zealand.

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P. R. Adams

Department of Physiology & Biophysics,
University of Texas Medical Branch,
Galveston, Texas 77550.

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Clinical Sciences Division, Medical Sciences Building, University of Toronto, Toronto, Ontario Canada M5S 1A8.

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S. Lahiri

Department of Physiology and Institute for Environmental Medicine, University of Pennsylvania School of Medicine, Philadelphia 19104.

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Hungarian Biochemical Society, H-11 Budapest, P. O. Box 451, Hungary.

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J. T. Duniec & S. W. Thorne

CSIRO, Division of Plant Industry, P. O. Box 1600 Canberra City, ACT 2601 Australia.

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K. Apostolov and W. Barker

Department of Virology Royal Postgraduate Medical School, Hammersmith Hospital, London, W12 0HS, England

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T. Rowley, B. M. Ohisson-Wilhelm and B. A. Farley

Division of Genetics, Box 641, University of Rochester Medical Center, 601 Elmwood Avenue, Rochester, N. Y. 14642.

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R. Patzelt-Wenczler & W. Schoner

Institut für Biochemie und Endokrinologie der Justus-Liebig-Universität, Gießen-Frankfurterstrasse 100, D-6300 Gießen, Federal Republic of Germany.

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C. Grise, R. Boucher, G. Thibault & J. Genest

Clinical Research Institute of Montreal, 110 Pine Ave, West Montreal, P. Q. Canada H2W 1R7.

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C. F. Bearer, L. K. Chang, G. C. Rosenfeld & W. J. Thompson*

Department of Pharmacology. The University of Texas Medical School, Houston, Texas 77025.

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Department of Biochemistry, Imperial College, London SW72 AZ, England.

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Biochemisches Institut der Universität Freiburg, Hermann Herder Strasse 7, D-7800 Freiburg, Federal Republic of Germany.

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Department of Pharmacology, Marshall University School of Medicine, Huntington, W. V. 25701.

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J. Tremblay, G. Thibault, J. Gutkowska, R. Boucher & J. Genest

Clinical Research Institute of Montreal, 110 Pine Ave, West, Montreal, P. Q. Canada H2W 1R7.

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Institute of Medical Biology, University of Tromso, P. O. Box 977 N-9001 Tromso, Norway.

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Division of Endocrinology and Metabolism, Department of Medicine, Medical College of Virginia, Virginia Commonwealth University, Richmond, Virginia 23298.

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S. P. Halbert, J. Karsh & M. Anken

Research and Development, Core Laboratories Inc., P. O. Box 3704, Miami Fla 33127.

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Pathologisches Institute der Universität Hamburg, Martinistrasse 52, 200 Hamburg, 20.

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B. F. Semenov

Institute of Polimyelites and Viral Encephalitides. USSR Academy of Medical Sciences, 142782 Moscow, USSR.

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Biochem. Abteilung Troponwerke GmbH & Co KG Berliner Str. 220-232, 5000 Köln 6

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Division of Biochemistry, Department of Chemistry, University of Calgary, Calgary, Alberta, Canada T2N 1N4.

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J. L. Marx†

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Department of Biochemistry, University of Alberta, Edmonton, Alta, Canada T6G 2H7.

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†Address not available.

Biological Institute, Faculty of Science, Tohoku University, Sendai 980, Japan.

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McGill Cancer Centre, 2655 Drummond, Montreal, P. O., Canada H3G 1Y6.

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Department of Molecular Biology, Genentech, Inc, South San Francisco, California, 94080.

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Department of Biochemistry, Osaka City University Medical School, Japan 545.

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W. A. Bauman & R. S. Yalow

Department of Clinical Sciences, Albert Einstein College of Medicine at Montefiore Hospital and Medical Center, 111 East 210th Street Bronx, New York 10467.

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K. Igarashi, K. Kashiwagi, T. Kakegawa, R. Aoki & S. Hoiose

Faculty of Pharmaceutical Sciences, Chiba University Yayoi-cho, Chiba 260, Japan.

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G. F. Smith, E. Slattery & P. Lengyel*

Department of Molecular Biophysics and Biochemistry, Yale University, New Haven, Connecticut 06511

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L. Dubeau, C. Hours & D. T. Denhardt

Cancer Research Laboratory, University of Western Ontario, London, Ontario Canada N5A 6BA.

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M. M. Shemyakin Institute of Bioorganic Chemistry, USSR Academy of Sciences Moscow.

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T. W. Flegel

Department of Microbiology, Faculty of Science, Mahidol University, Rama V Road, Bangkok, Thailand.

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T. J. Ryan

Division of Laboratories and Research New York State Department of Health Albany, New York 12201.

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University of Paderborn, Fachbereich Naturwissenschaften II, Labor für Organische Chemie, Warburger Strasse 100, D-4790, Paderborn, FRG.

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I. Engelberg-Kulka, L. Dekel & M. Trauli-Reches.

Department of Molecular Biology, Institute of Microbiology, Hebrew University, Hadassah Medical School, Jerusalem, Israel.

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M. Adesnik and F. Maschio

Department of Microbiology, New York University School of Medicine, 550 First Avenue, N. Y. City, New York, USA 10016.

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K. E. M. Hastings & S. Millward*

Department of Biochemistry, McGill University, 3655 Drummond Street, Montreal, P. Q. Canada H3G 1Y6.

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D. Mahuran & J. A. Lowden

Research Institute, Hospital for sick children, Toronto, Ont, Canada M5G 1X8.

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W. A. Bridger

Department of Biochemistry, University of Alberta, Edmonton, Alta, Canada T6G 2H7.

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V. V. Konstantinov & A. Yu Misharin

Institute of Molecular Biology, Academy of Sciences of the USSR, Moscow.

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Cancer Research Center, Academy of Medical Sciences of USSR, Moscow.

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L. H. Raptis & P. Bourgaux

Department de Microbiologie Faculté de Médecine Centre Hospitalier Universitaire, Université de Sherbrooke, Sherbrooke, Quebec J1H 5N4 (Canada).

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M. Gudino & W. V. Miller

The American Red Cross Blood Services, Missouri-Illinois Region, 4050 Lindell Boulevard, St. Louis Mo, 63108

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W. Bruns, H. Keppeler & D. Barthod

Institute of Pharmacology, University of Cologne, Gleuelerstr, 24, D-5000 Köln 41, FRG.

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Department of Chemistry, University of Montreal, Montreal, P. Q. Canada H3C 3V.

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Yon H. D. Dell, J. Fiedle, H. Jacobi & J. Kolle

Biochem. Abteilung, Troponwerke GmbH & Co. KG Berliner Str. 220-232 500 Köln 80.

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Chodera, D. Cenajek & K. Mazurek

Medical Academy Poznan, Department
Pharmacology, ul. Friedny 10, 61-701
Poznan, Poland.

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C. S. Wu, J. C. Robbins*, R. L.
Gaglianese, M. M. Ponpipom & T. Y.
Chen

Department of Membran and Arthritis
Research Merck Sharp and Dohme
Research Laboratories, Rahway NJ07065,
USA.

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M. G. Bogaert, M. T. Roseel, R. Deberdt
& C. Vranckx

Heymans Institute of Pharmacology
University of Gent Medical School De
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E.R. Andrew, D. J. Bryant, E.M. Cashell
& Q. A. Meng*

Department of Physics, University Park,
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L. E. Mallette

Medical Service IIIE, VA Medical Center,
2002 Holcombe Blvd, Houston, Texas 77211.

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properties and bioavailability by oral
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P. Schiantarelli, D. Acerbi & G. Bovis

Chiesi farmaceutici S. P. A., Research
Division Via Palermo, 30 I-43100 Parma
(Italy).

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M. Ahmed, J. S. Burton, J. Hadgraft, &
I. W. Kellaway*

The Welsh School of Pharmacy Univer-
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Von H. D. Dell, H. Jacobi, R. Kamp & J. Kolle

Biochem. Abteilung, Troponwerke GmbH & Co. KG Berliner Str. 220-232, 5000 Köln 80.

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Von H. Maier-Lenz, L. Ringwelski & A. Windorfer

Biodesign GmbH-A, Institut für klinische Pharmakologie, Carl Meixner Str. 81-83, 7800 Freiburg Brg.

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Von N. Marecek, P.W. Lucker*, B. Pentz, P. Altmayer und K. Wetzelsberger

Lucker Institut für klinische Pharmakologie, Rebstockel 13, 6719 Bobenheim am Berg.

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J. W. Apsiman, D. Moir & K. Yamasaki
Department of Chemistry, Carleton University Ottawa, Ont Canada K1S 5B6.

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Laboratory of Organic Chemistry, State University, Utrecht, The Netherlands.

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R. A. Pauptit & J. Trotter

Department of Chemistry, University of British Columbia, Vancouver, B.C. Canada V6T 1Y6.

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F. A. Fuhrman

Hopkins Marine Station of Stanford Uni-
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of Medicine, Stanford, California 94305.*Federation Proceedings*, **40**, 7 (Jan 81)**R81L094. Physalolactone B: a novel
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Banaras Hindu University, Varanasi
231005, India.*Chemistry & Industry*, No. **2**, 62(17 Jan 81)**R81L095. Plant sources of hepato-
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CSIRO Division of Animal Health, Pri-
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traktile einflüsse eines pflanzlichen
kombinations preparates auf die
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meers-chweinchendarms.**

Von J. Westendonf & W. Vahlensieck

Abteilyng fur Allgemeine Toxikologie der
Universitat Hamburg, Grindel-Allee 117,
2000 Hambarg 13.*Arzneimittel Forschung/Drug Research*, **31**,
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J. T. Wrobel & J. A. Glinski

Department of Chemistry, University of
Warsaw, 02-093 Warsaw Pasteura 1 Poland.*Canadian J. of Chemistry*, **59**, 1101 (1 Apr. 81)**R81L098. Studies on Indonesian me-
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Anamitta cocculeus.**R. Verpoorte, J. Siwon, MEM. Tiekens &
A. B. SvendsenDepartment of Pharmacology, State Uni-
versity of Leiden, Gorlaeus Laboratories
P. O. Box 9502 (2300RA) Leiden, The
Netherlands.*J. of Natural Products (LLoydia)*, **44**, 221
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M. D. Antoun & O. M. A. Taha

Department of Medicinal Chemistry and Pharmacognosy, The School of Pharmacy and Pharmacological Sciences, Purdue University, West-Lafayette, Indian 47907.

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J. Rokach, R. N. Young, M. Kakul, Cheuk-Kun Lau, R. Seguin, R. Frechet & Y. Guindon

Merck Frosst Laboratories, P. O. Box 1005, Pointe-Clairo/Dorval, Quebec, Canada H9RU P8.

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M GENERAL

R81M057. At long last, Linus Pauling lands N. C. I. grant.

M. Sun†

Science, **212**, 1126 (5th June 81)

R81M058. Backing for salaried general practice service.

Pharmaceutical J., **226**, 511 (16 May, 81)

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Pharmaceutical J., **226**, 511 (16 May, 81)

R81M060. A centenary of pharmacy education in Australia.

V. Feehan

Executive Director of the Victorian College of Pharmacy.

Pharmaceutical J., **226**, 521 (16 May, 81)

R81M061. Comparative toxicology of environmental health and national productivity.

J. Lederberg

The Rockefeller University, York Avenue at 66th Street, New York, NY 10021.

American J. of Medicine, **70**, 9 (Jan. 81)

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Eliot Marshall†

Science, **212**, 1120 (5 June, 81)

R81M063. In India, will small be possible?

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Lancet, **i**, 1085 (16 May, 81)

†Address not available.

**M064. Library of medicine ver-
private enterprise.**

Holden†

ce, 212, 1125 (5th June, 81)

**M065. Nomenclature announce-
ments: IUPAC-IUB joint commission
biochemical nomenclature (JCBN)
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monosaccharides and their deriva-
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Archives of Biochemistry & Biophysics, 207,
(1 April, 81)

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Milunsky

Genetic Division, Eunice Kennedy Shriver
Center, 200 Trapelo Road, Waltham MA
0154.

American J. of Medicine, 70, 7 (Jan.
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Sir Clavering Fison lecture.**

Cottrell

Master of Jesus College, Cambridge, U. K.
Chemistry & Industry, No. 2, 42 (17 Jan. 81)

Address not available.

R81M068. The rise and fall of disease.

A. J. Bollet

Department of Medicine, Danbury Hos-
pital, Danbury, CT 06810.

American J. of Medicine, 70, 12 (Jan. 81)

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physician in the health-care "indus-
try".**

T. P. Almy

Dartmouth Medical School, Hanover NH
03755.

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A. Soffer

P. O. Box 776, Park Ridge IL 60008.

Archives of Internal Medicine, 141, 20 (Jan.
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J. A. DiBiaggio

University of Connecticut Storrs CT
06268.

New England J. of Medicine, 304, 228 (22
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N NEW TECHNIQUES

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D. J. Doyle & M. L. Hyde

Institute of Biomedical Engineering, University of Toronto.

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Department of Biochemistry, University Medical School, P. O. Box 6 H4012 Debreen, Hungary.

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S. E. Walker & P. E. Coates

Department of Pharmacy, Sunny Brook Medical Centre, 2075 Bayview Avenue, Toronto, Ontario M4N 3M5, Canada.

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S. Iscoe & R. A. Young

Departments of Physiology and Biomedical Engineering, Queen's University Kingston, Ont K7L 3N6, Canada.

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M. C. Nahata & D. A. Powell

College of Pharmacy and Medicine, Ohio State University, 500, West 12th Avenue Columbus, OH43210 USA.

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R. Gochin, I. Kanfer* & J. M. Haigh

School of Pharmaceutical Science Rhodes University, Grahamstown 6101 South Africa.

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Hoechst Ag. Pharma Syn. D-6230 Frankfurt 80, W. Germany.

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D. R. Buckle

Beecham Pharmaceuticals Research Division
Biosci, Research Centre Surrey KT18 5X0,
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W. Schneider & R. Sauerbier

University of Freiburg, Pharmazeut
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A. A. Escner, J. A. Roels & N. W. F. Kossen

Biotechnology Group, Department of Chemical Engineering, Delft University of Technology, Jaffalan 9, P. O. Box 5029 2600 G. A. Delft, The Netherlands.

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Y. Y. Linko & P. Linko*

Department of Chemistry, Helsinki University of Technology, SF 02150 Espoo 15, Finland.

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P. Gramatica, B. M. Ranzi, & P. Manitto

Istituto di chimica organica della Facolta di Scienze della universita degli studi di Milano centro di studi per la sostanze organiche naturali del C. N. R., Via Saldini 50, 20133 Milano, Italy.

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Division of Medicinal Chemistry, College of Pharmacy, The University of Texas Austin Texas 78712.

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Istituto di chimica della Facolta di Scienze della universita degli studi di Milano centro di studio per le sostanze organiche naturali del CN. R Via Saldini 50, 20133 Milano, Italy.

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L. Gianfreda & G. Grelo Jr.

Istituto di Farmacologia Sperimentale Facolta di Farmacia dell' universita di Napoli, Italy.

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A BIBLIOGRAPHY*

ON

PRIMAQUINE—AN ANTIMALARIAL DRUG

Compiled by
Dr. A. K. Goel

PRIMAQUINE:

Chemical Names: N⁴-(6-methoxy-8-quinolinyl)-1,4-pentanediamine and 8-(4-amino-1-methylbutylamino)-6-methoxyquinoline.

Molecular Formula: C₁₈H₂₁N₃O

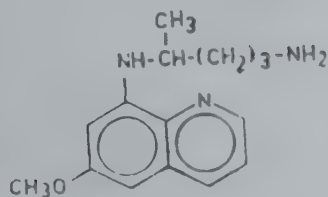
Molecular Weight: 259.34.

Boiling Point: 175-179°C at 0.2 mm/Hg

Solubility: Soluble in ether.

Therapeutic category: Antimalarial.

Chemical Structure:



1. The bibliography covers literature on primaquine for period 1975-80.
2. Arrangement of the entries is in chronological order. Entries in each year have further been arranged alphabetically by name of first author.
3. The format of an entry is: name(s) of author(s), title of the article, name of the Journal, vol. no., page no., year and language. Where ever language is not indicated it only means that the article is in English.
4. Entries marked with an asterisk(*) indicate that the *photocopies of the original articles are available from NICDAP, Central Drug Research Institute, Lucknow.*
5. Surnames with full stop indicate that they are truncated.
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Leishmania maxicana amazonensis. *Annals of
Tropical Medicine and Parasitology*, **74**,
299-320.

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its application to basic drugs using an
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ENDOCRINE SYSTEM

A175. Aphrodisiacs—a psychosocial perspective.

J. Bose

S. Medical College and Hospital,
Patna-700 014.

Indian J. of History of Science, **16**, 100
(May 81)

**A176. Bandarnaike memorial
Ayurvedic Research Institute
Sri Lanka**

Ayurveda, **33**, 201 (Mar. 81)

**A177. Binding of an inhibin-like
protein from bull seminal plasma
to bovine pituitary membranes.**

R. Sairam, M. R. Ranganathan &
Ramasharma

Reproduction Research Laboratory,
National Research Institute of Montreal,
3800 Avenue West, Montreal, Que.
H3W 1R7, Canada.

Molecular and Cellular Endocrinology, **22**,
(May 81)

**A178. Characterization and com-
parison of progesterone receptor in
mouse vagina and uterus.**

C. Allen & W. W. Leavitt

University of Louisville, P. O. Box 35260,
Louisville, KY 40232, U.S.A.

Journal of Steroid Biochemistry, **14**, 29 (Jan. 81)

**R81A179. Contraceptive efficacy of
microdose norethisterone enanthate:
A study on its use in polydimethylsi-
loxane implants.**

Umesh K. Srivastava

Division of Endocrinology, Central Drug
Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 416
(May 81)

**R81A180. Effect of hypophysectomy
on spermatogenesis, interstitial
Leydig cells & male accessory organs
in the garden lizard *Colotes versicolor*
(Dand).**

S. G. Gaitonde & B. Y. M. Gouder

Department of Zoology, Karnatak Uni-
versity, Dharwad-580 003.

Indian J. of Experimental Biology, **19**, 314
(Apr. 81)

**R81A181. Effect of temperature on
some renal & posterior pituitary
function of rats.**

V. N. Puri & J. Schnermann

Division of Pharmacology, Central Drug
Research Institute, Lucknow-226 001.

Indian J. of Experimental Biology, **19**, 494
(May 81)

R81A182. Enzymatic evaluation of bovine follicular fluid as influenced by size & presence of corpus luteum.

B. K. Dave

Animal Production and Management, Livestock Farm, S. N. Agriculture University, Adhartal, Jabalpur-482 004.

Indian J. of Experimental Biology, **19**, 593 (June 81)

R81A183. Experimental studies with a thread containing mefenamic acid introduced into the rat uterus.

U. Gupta, M. Malhotra, K. C. Saini & R. R. Chaudhury

Department of Pharmacology, Post-graduate Institute of Medical Education and Research, Chandigarh-160 012.

Indian J. of Experimental Biology, **19**, 413 (May 81).

R81A184. Isolation and characterization of bovine seminal plasma protein inhibiting pituitary fish secretion.

M. R. Sairam, M. R. Ranganathan, K. Ramasharma & P. Lamothe

Reproduction Research Laboratory, Clinical Research Institute of Montreal, 110 Pine Avenue West, Montreal, Que H2W 1R7, Canada.

Molecular and Cellular Endocrinology, **22**, 231 (May 81).

R81A185. Isolation and characterization of inhibin from human seminal plasma.

A. N. Thakur, A. Y. Vaze, B. Dattamurthy & A. R. Sheth*

Institute for Research in Reproduction (ICMR), Bombay-400 012.

Indian J. of Experimental Biology, **19**, (Apr. 81)

R81A186. An isomer of aldosterone.
V. R. Mattox, P. C. Carpenter & E. C. Mayo
Mayo Foundation & Mayo Graduate School, Rochester, MN 55901, U.S.A.

J. of Steroid Biochemistry, **14**, 19 (Jan. 81)

R81A187. Influence of castration on testosterone propionate, androstenedione & estradiol-17 β on LDH & isoenzymes of vas deferens.

K. Balasubramanian, Ben M. J. Perera & P. Govindrajulu

Department of Endocrinology, P. G. Institute of Basic Medical Sciences, Taramani, Madras-600 042.

Indian J. of Experimental Biology, **19**, (May 81)

R81A188. Influence of oral contraceptive of differing dosages on chymotrypsin, γ -glutamyltransferase and alkaline phosphatase.

B. Herbeth, A. Bagrel, B. Dalo & O. Dalo

Centre de Médecine Préventive, Avenue duc Doyen Jacques Parisot, Vandœuvre-Nancy, France.

Clinica Chimica Acta, **112**, 293 (28 May 81)

R81A189. Influence of prostaglandins on sperm motility.

Schlegel, S. Rotermund, G. Färber
E. Nieschlag

Universitäts-Frauenklinik und Abtlg.
Experimentelle endokrinologie der Univer-
sitäts—Franklinik Westring 11, D-4400
Münster, F. R. Germany.

Prostaglandins, **21**, 87 (Jan. 81)

R81A190. Prostaglandin E₁ and E₂ in bovine semen. Quantification by gas chromatography.

Mai & J. E. Kinsella

Institute of Food Science, Cornell Uni-
versity, Ithaca, NY 14853, U.S.A.

Prostaglandins, **21**, 153 (Jan. 81)

R81A191. Prostaglandins and steroidogenesis in isolated bovine adrenal cell: Effects of ACTH, prostaglandin-synthesis inhibitors, prostaglandins and prostaglandin analogs.

P. H. Rolland, A. M. Rolland, L. Benkoel
& M. Toga

Laboratoire de Cancerologie Experi-
mentale, Faculté de Médecine de
Marseille (Sector Nord), Marseille,
France.

Molecular & Cellular Endocrinology, **22**, 179
(May 81)

R81A192. Potentiation of prostaglandins evoked contractions of isolated rat uterus by vasicine hydrochloride.

Ramesh Lal & P. L. Sharma*

Department of Clinical Pharmacology,
Postgraduate Institute of Medical Educa-
tion and Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 641
(Apr. 81)

R81A193. Pubertal changes in androgen composition of rat rete testes and cauda epididymal fluids.

R. G. Foldes & J. H. Leathem

Bureau of Biological Research, Rutgers—
The State University, New Brunswick,
NJ 08903, U.S.A.

J. of Steroid Biochemistry, **14**, 109 (Jan. 81)

R81A194. Role of thyroxine & gonadotropins on the mobilization of ovarian cholesterol in a teleost *Anabas testudineus* (Bloch).

Shanta Sen & Samir Bhattacharya*

Department of Zoology, School of Life
Science, Visva-Bharati University, Santi-
niketan-731 235.

Indian J. of Experimental Biology, **19**, 408
(May 1981)

R81A195. Role of testosterone on mitomycin C induced changes in testicular histology in rats.

S. Banik, C. Deb & B. Paul

Department of Physiology, Calcutta
University, 92 Acharya Prafulla Chandra
Road, Calcutta-700 009.

Indian J. of Experimental Biology, **19**, 386
(Apr. 81)

R81A196. Separation of prostaglandins A, B, D, E, F thromboxane and 6-ketoprostaglandin $F_{1\alpha}$ by thin-layer chromatography.

S. K. Goswami & J. E. Kinsella

Institute of Food Science, Stocking Hall,
Cornell University, Ithaca NY 14853,
U.S.A.

J. of Chromatography, **209**, 334 (May 81)

R81A197. Synthesis of oxytocin, arginine-vasopressin and its deamino-analogue using 2, 4, 6 trimethylbenzyl group for protection of the cysteine sulfur.

F. Brtník, M. Krojido, T. Barth & K. Jost

Institute of Organic Chemistry & Biochemistry, Czechoslovak Academy of Sciences, 16610 Prague. *Collection of Czechoslovak Chemical Communications*.

R81A198. Transport of water-soluble vitamins in pregnancy.

N. Appaji Rao

Department of Biochemistry, Indian Institute of Science, Bangalore-560 012.

Current Science, **L**, 299 (5 Apr 81)

R81A199. Uterine prostaglandins and F levels during pregnancy in the rat.

S. K. Garg

Department of Pharmacology, Postgraduate Institute of Medical Education and Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 63 (Apr. 81)

B NERVOUS SYSTEM

R81B193. Anti-inflammatory agents: part IV-systems & anti-inflammatory activity of 4-(5-arylisoaxazol-3-yl) phenylalkanoic acids & their methyl esters.

D. R. Sridhar, C. V. Reddy Sastry, O. P. Bansal, P. P. Singh & C. Seshagiri Rao

Chemistry Division, IDPL Research Centre, Indian Drugs & Pharmaceuticals Ltd., Hyderabad-500 037.

Indian J. of Chemistry, **20B**, 401 (May 81)

R81B194. Axotomized cervical motoneurons: An autoradiographic study.

J. L. Cova & K. D. Barron

Research Service (Neuropathology) Veterans Administration Medical Centre and the Department of Neurology, Albany Medical College, Neil Hellman Medical Research Building, Albany, New York 12208.

Experimental & Molecular Pathology, **30**, 159 (Apr. 1981)

R81B195. Cerebrospinal fluid enzyme activity after hyaluronidase administration in spinal arachnoiditis.

S. Sridhara Rama Rao, M. N. Subhash
M. Gouric-Devi

Department of Neurochemistry, National
Institute of Mental Health & Neurosci-
ences, Bangalore-560 029.

Indian J. of Medical Research, **73**, 955
(June 81)

R81B196. A convenient synthesis of met-enkephalin using 1 β -naphthalenesulphonyloxybenzo triazole for peptide bonds formation.

S. D. Sharma & K. B. Mathur*

Central Drug Research Institute, Lucknow-
226 001.

Indian J. of Chemistry, **20B**, 227 (Mar. 81)

R81B197. Creatine kinase isoenzyme activity in cerebrospinal fluid and plasma from a patient with a fatal bacterial meningitis.

H. Briem & L. Rombo

Department of Infectious Diseases, Karo-
linska Institute, Roslagstull Hospital, Box
59011, S-11489 Stockholm, Sweden.

Clinica Chimica Acta, **112**, 361 (28 May 81)

**R81B198. Effect of naloxone pretreat-
ment on morphine induced analgesic
tolerance & sensitivity changes during
chronic treatment in mice.**

S. Ramaswamy, N. Padmanabha Pillai,
V. Gopalkrishnan & M. N. Ghosh

Department of Pharmacology, Jawaharlal
Nehru Institute of Postgraduate Medical
Education & Research, Pondicherry.

Indian J. of Experimental Biology, **19**, 555
(June 81)

**R81B199. Effect of single and
repeated convulsions on glutamate
decarboxylase (GAD) activity and (3 H)
muscimol binding in the rat brain.**

C. K. Atterwill, C. Batts, M. R. Bloom-
field

MRC Unit and University Department
of Clinical Pharmacology, Radcliffe Infir-
mary, Woodstock Road, Oxford OX2
6HE, UK.

J. of Pharmacy & Pharmacology, **33**, 329
(May 81)

**R81B200. Medicinal use of opium
and cannabis in medieval India.**

G. N. Chaturvedi, S. K. Tiwari & N. P. Rai

Department of Kayachikitsa, Institute of
Medical Sciences, Banaras Hindu Univer-
sity, Varanasi-221 005.

Indian J. of History of Science, **16**, 31
(May 81)

**R81B201. Neurohypophysial pepti-
dides: Design of tissue specific
agonists and antagonists.**

W. H. Sawyer, Z. Grzonka & M. Manning

Department of Pharmacology, Columbia
University College of Physicians and
Surgeons, New York NY 10032.

Molecular & Cellular Endocrinology, **22**, 117
(May 81)

R81B202. Nicotinic release of noradrenaline in the presence of tetrodotoxin from sympathetic nerve in rabbit isolated atria.

C. Sarantos-laska, M. W. McCulloch, M. J. Rand & D. F. Story

Department of Pharmacology, University of Melbourne, Victoria, 3052, Australia.

J. Pharmacy & Pharmacology, **33**, 315 (May 81)

R81B203. A non-invasive computerized measurement of motor neurone refractory.

S. Faisst & M. Meyer*

Department of Neurology, University Hospital Zurich, Ramistrasse 100, 8091 Zurich, Switzerland.

Electroencephalography & Clinical Neurophysiology, **51**, 548 (May 81).

R81B204. Serum haptoglobins in health and disease.

A. R. Aroor, K. A. Krishnan & T. N. Pattabiraman*

Department of Biochemistry, Kasturba Medical College, Manipal-576 119.

Indian J. of Medical Research, **73**, 941 (Jun. 81)

R81B205. Some methods to study information transmission through multi-channel neuronal systems.

U. Windhorst, R. Schwestka & R. Schaumburg

Physiologisches Institut, Lehrstuhl I, Universität Göttingen, D-3400 Göttingen, G. F. R.

Electroencephalography and Clinical Neurophysiology, **51**, 567 (May 1981)

R81B206. Some new schiffs bases derived from vanillin as possible anticonvulsants.

S. S. Tewari, M. I. Husain & G. Srivastava

Chemistry Department, Lucknow University, Lucknow.

J. of the Indian Chemical Society, **LVI**, 214 (Mar. 81).

R81B207. Structure-activity relationships among hallucinogenic tryptamine derivatives evaluated in schedule-controlled behaviour.

R. A. Harris, E. Homfeld & E. Caigne

The Harry S. Truman Memorial Veterans Hospital and the Department of Pharmacology, University of Missouri Medical Centre, Columbia, Missouri, 65211, U. S. A.

J. of Pharmacy & Pharmacology, **33**, 3 (May 81)

R81B208. A study on the acetylcholinesterase activity at the neuromuscular junctions in tibialis anterior and soleus muscles of the dog.

S. Malathi & P. Kaliraj

Department of Anatomy, Medical School, Calabar University, Calabar, Nigeria.

Current Science, **L**, 443 (20 May 81)

B209. Traumatic lesions of the brain stem: Electroencephalographic and computer-tomographic follow-up study in the acute phase.

Kruger, W. I. Steudel & H. C. Grau*

Abteilung für Neurochirurgie, des Universitätsklinikums, Schleusenweg 2-16, D-6000 Frankfurt am Main 71, G.F.R..

Electroencephalography & Clinical Neurophysiology, **51**, 526 (May 81)

R81B210. Treatment of headaches.

Arjundas & A. Deepak

Natraj Nursing Home, Pantheon Road, Madras-600 008.

Drugs Bulletin, **4**, 22 (Apr. 81)

R81B211. The use of critical flicker fusion frequency test for evaluating some central nervous effects of two indomethacin formulations.

J. E. Carless & J. S. Rowe

Department of Pharmaceutics, The School of Pharmacy, University of London, 29-39, Brunswick Square, London, WC 1 1 AX UK.

J. of Pharmacy & Pharmacology, **33**, 336 (May 81)

CARDIOVASCULAR SYSTEM

R81C131. Detection of human cardiac activity at apex region by Laser speckle.

S. Periasamy, Megha Singh & B. M. Subramaniam

Biomedical Engineering Division, Indian Institute of Technology, Madras-600 036.

Current Science, **L**, 302 (5 Apr. 81)

R81C132. Effect of verapamil (isoprenaline) on experimental myocardial infarction in rhesus monkeys.

R. N. Chakravarti, P. L. Sharma, I. S. Anand, P. Alamelu Manga & P. L. Wahi

Department of Experimental Medicine, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 625 (Apr. 81)

R81C133. Mitochondrial alterations induced by selenium in guinea pig myocardium.

G. Dini, F. Franconi & F. Martini

Institute of General Pathology & Institute of Interfaculty of Pharmacology & Toxicology of University of Florence, Italy.

Experimental & Molecular Pathology, **34**, 226 (Apr. 1981)

R81C134. A model of excitation-contraction coupling mammalian cardiac muscle.

A. Y. K. Wong

Department of Physiology & Biophysics, Dalhousie University, Halifax, N. S., Canada, B3H4H7.

J. of Theoretical Biology, **90**, 37 (7 May 81)

R81C135. Nifedipine—a new calcium antagonist in experimental myocardial necrosis.

P. K. Ganguly, L. M. Srivastava, P. S. Bora, M. P. Gupta & S. D. Seth

Department of Biochemistry, All India Institute of Medical Sciences, New Delhi-110 029.

Indian J. of Medical Research, **73**, 617 (Apr. 81)

R81C136. The origin and development of pulse examination in medieval India.

N. P. Rai, S. K. Tiwari, S. D. Upadhyaya & G. N. Chaturvedi

Department of Kayachukitsa, Institute of Medical Science, Banaras Hindu University, Varanasi-221 005.

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R81C137. Positive inotropic responses to furosemide on isolated frog heart.

B. R. Chandiramani & S. C. Verma*

Department of Pharmacology, I. M. College of Pharmacy, Ahmedabad-380 001

Indian J. of Experimental Biology, **19**, 55 (Jun. 81)

D RESPIRATORY SYSTEM

R81D123. Assessment of airflow obstruction: A comparison of various methods of evaluation.

J. N. Pande & J. S. Guleria

Respiratory Laboratory, Department of Medicine, All India Institute of Medical Science, Ansari Nagar, New Delhi-110 029.

Indian J. of Chest Diseases & Allied Sciences, **XXIII**, 10 (Jan. 81)

R81D124. Cromolyn sodium therapy in bronchial asthma.

J. N. Pande

Respiratory Laboratory, Department of Medicine, All India Institute of Medical Science, Ansari Nagar, New Delhi-110 029.

Indian J. of Chest Diseases & Allied Sciences, **XXIII**, 1 (Jan. 81)

R81D125. Disodium cromoglycate in bronchial asthma.

A. A. Mahashur, M. Chandrasekharan & S. R. Kamat*

Department of Chest Medicine, Thoracic Centre, K. E. M. Hospital, Bombay-400 012.

Indian J. of Chest Diseases & Allied Sciences, **XXIII**, 4 (Jan. 81)

R81D126. Effects of (—) nicotine on the release and inactivation of prostaglandins in the perfused rat lung.

C. N. Berry, N. D. Umney & J. R. S. Hoult

Department of Pharmacology, King's College, Strand, London WC 2R 2LS, UK

J. Pharmacy & Pharmacology, **33**, 326 (Mar. 81)

R81D127. Evaluation of total and specific Ig E determinations in normal children and children suffering from asthmatic bronchitis with suspected allergic disease.

L. B. Bruynzeal & L. A. M. J. Houben
Department of Pulmonary Diseases, University Hospital, Catharijnesingel 101, 6511 GV Utrecht, The Netherlands.

Clinica Chimica Acta, **112**, 315 (28 May 81)

R81D128. Hyposensitization in asthma: A review.

O. Warner

Brompton, St. Mary's and St. Charles Hospitals, London.

J. of the Royal Society of Medicine, **74**, 60 (Jan. 81)

R81D129. Primary pulmonary hypertension.

M. T. Abraham, G. Cherian, I. P. Sukumar & S. Krishnaswami

Department of Cardiology, Christian Medical College Hospital, Vellore-632 004.

Indian J. of Chest Diseases & Allied Sciences, **XXIII**, 21 (Jan. 81)

METABOLIC AND DEGENERATIVE DISORDERS

R81F196. Assessment of lipid parameters in antidiabetic combination therapy regime.

A. V. Potnis, S. P. Joshi, P. P. Metha & S. G. Kinare

Department of Biochemistry, K. E. M. Hospital, Parel, Bombay-400 012.

Bombay Hospital J. **23**, 9 (Jan. 81)

R81F197. Biological activity of some insulin derivatives.

A. Siseva, L. M. Sirakov, J. Slaninova & T. Barth

Department of Biochemistry, Medical Academy, 1431 Sofia, Bulgaria.

Collection of Czechoslovak Chemical Communications, **46**, 300 (1981)

R81F198. Biological significance of liver cell poly-ploidy: An hypothesis.

I. V. Uryvaeva

N. K. Koltsov Institute of Developmental Biology, U.S.S.R. Academy of Sciences, Moscow, U.S.S.R.

J. of Theoretical Biology, **89**, 557 (21 Apr. 81)

R81F199. Changes in myocardial & aortic lipolytic activity & fecal excretion of sterols & bile acids in isoproterenol-induced myocardial infarction in rats.

Saleena Mathew, P. V. G. Menon & P. A. Kurup

Department of Biochemistry, University of Kerala, Trivendrum-695 001.

Indian J. of Biochemistry & Biophysics, **18**, 131 (Apr. 81)

R81F200. Deleterious effect of prednisolone in HBsAg-positive chronic active hepatitis.

K. C. Lam, C. L. Lai, R. P. Ng, C. Treppe & P. C. Wu

University Department of Medicine, Queen Mary Hospital, Pokfula m Rd., Hong Kong.

New England J. of Medicine, **304**, 380 (12 Feb. 81)

R81F201. Differences in corticosterone binding by regions of the central nervous system in normal and diabetic rats.

S. Tornello, O. Fridman, L. Weisenberg, H. Coirini & A. F. De Nicola

Instituto de Biologia Medicina Experimental, Obligado 2490, 1428 Buenos Aires, Argentina.

J. of Steroid Biochemistry, **14**, 77 (Jan. 81)

R81F202. Effect of hypothermia on serum cholesterol & protein bound iodine in dogs.

S. L. Mali & D. R. Singhvi

Department of Physiology and Biochemistry, S. P. Medical College, Bikaner-334 001.

Indian J. of Experimental Biology, **19**, 582 (June 81)

R81F203. Enhanced rectal absorption of insulin and heparin in rats in the presence of non-surfactant adjuvants.

T. Nishihata, J. H. Rytting, T. Higuchi & L. Caldwell

Pharmaceutical Chemistry, Department of the University of Kansas, Lawrence, Kansas 66045, U.S.A.

J. Pharmacy & Pharmacology, **33**, (May 81)

R81F204. A family of models for elimination of substrate in the liver.

S. Johansen & S. Keiding

Institute of Mathematical Statistics, University of Copenhagen, Denmark.

J. of Theoretical Biology, **89**, 549 (21 Apr. 81)

R81F205. Hepatic glucose metabolism in tryptophan induced fatty liver.

P. Ramakrishna Rao, A. Bhaskar R. P. K. Joseph & S. Ramakrishnan

Department of Biochemistry, Jawahar Institute of Postgraduate Medical Education & Research, Pondicherry-605 006.

Indian J. of Biochemistry & Biophysics, **128** (Apr. 81)

R81F206. IgG heavy-chain (Gm) allotypes and immune response to insulin in insulin-requiring diabetes mellitus.

Y. Nakao, H. Matsumoto, T. Miyazaki, N. Mizuno & others

Third Division, Department of Medicine, Kobe University School of Medicine, Kusunoki-cho 7 chome, Ikuta-ku, Kobe 650, Japan.

New England J. of Medicine, **304**, (12 Feb. 81)

**F207. Hepatic lipolysis during
muscular electrical stimulations.**

V. Narasimha Moorthy, P. Reddanna
S. Govindappa

Department of Zoology, S. V. University,
Tirupathi-517 502.

Current Science, **L**, 261 (20 Mar. 81)

**R81F208. Hyperzincuria in insulin
treated diabetes mellitus—its relation
to glucose homeostasis and insulin
administration.**

McNair, S. Kiilerich, C. Christianen
and others

Department of Clinical Chemistry, Glo-
strup Hospital, University of Copenhagen,
DK-2600 Glostrup, Denmark.

Acta Chimica Acta, **112**, 343 (28 May 81)

**R81F209. Interspecific effects of
crustacean hyperglycemic principle.**

P. Sreenivasula Reddy & R. Ramamurthi

Department of Zoology, S. V. University,
Tirupathi-517 502.

Indian J. of Experimental Biology, **19**, 472
(May 81).

**R81F210. Macromolecular binding
of 5 β -H steroids in chick embryo
liver.**

A. I. Adigweme & Y. J. Abul-Hajj*

College of Pharmacy, University of Min-
nesota, Minneapolis, Minnesota 55455,
U.S.A.

J. of Steroid Biochemistry, **14**, 91 (Jan. 81)

**R81F211. Monocomponent insulin in
maturity onset diabetes mellitus.**

M. Viswanathan, A. Ramachandran, C.
Snehalatha & Mohan Viswanathan

Diabetes Research Centre, Madras.

J. of the Indian Medical Association, **76**, 73
(Mar, 81)

**R81F212. Naturally occurring athero-
sclerosis in rhesus monkeys.**

R. N. Chakravarti & R. S. Kukreja

Department of Experimental Medicine,
Postgraduate Institute of Medical Educa-
tion & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 603
(Apr. 81)

**R81F213. Prolactin and the regula-
tion of adipose tissue metabolism
during lactation in rats.**

D. J. Flint, R. A. Clegg & R. G. Vernon

Hannah Research Institute, Ayr KA6
5HL, Scotland.

Molecular & Cellular Endocrinology, **22**, 265
(May 81)

**R81F214. Protein factors in the regu-
lation of cholesterol biogenesis.**

T. Ramasarma

Department of Biochemistry, Indian Insti-
tute of Science, Bangalore-560 012.

Current Science, **L**, 431 (20 May 81)

R81F215. Serum concentration of procollagen-III-peptide in comparison with the serum activity of N-acetyl- β -glucosaminidase for diagnosis of the activity of liver fibrosis in patients with chronic active liver diseases.

W. Ackermann, G. Pott, B. Voss & others
Medizinische Universitätsklinik, Westring
3, D-4400 Munster, F.R.G.

Clinica Chimica Acta, **112**, 365 (28 May 81)

R81F216. Synthesis and antithyroid activity of some benzimidazolyl and benzenesulphonyl thiocarbamides.

P. K. Srivastava, J. S. Upadhyaya &
M. B. Gupta

Department of Chemistry, Banaras Hindu
University, Varanasi-221 005.

Current Science, **L**, 305 (5 Apr. 81)

R81F217. Thiamine & metabolism of glycosaminoglycans in rats fed cholesterol-free & cholesterol containing diet.

P. L. Vijayammal & P. A. Kurup

Department of Biochemistry, University
of Kerala, Trivendrum-695 001.

Indian J. of Biochemistry & Biophysics,
134 (Apr. 81).

G INFECTIOUS DISEASES

Viral

R81G109. Viral gastroenteritis.

N. R. Blacklow & G. Cukor

Division of Infectious Diseases, Department
of Medicine, University of Massachusetts
Medical School, 55 Lake Ave,
North Worcester, MA 01605.

New England J. of Medicine, **304**, 397
(12 Feb. 81)

Bacterial

R81G110. Antigen detection in the serum by counter-immunoelectrophoresis for an early diagnosis of typhoid fever.

A. K. Gupta & K. M. Rao

Central Water Laboratory, Biochemistry
Department, NICD, Delhi-110 054.

J. of the Indian Institute of Science, **62**, 105
(Dec. 80)

R81G111. Clinical trial with CI 1906 in lepromatous leprosy.

L. C. Anand, V. D. Tiwari, B. S. Rath
and O. Singh

Department of Dermatology & Venereology
(Western & Northern Command),
Bose Hospital, Delhi Cantt-110 010.

Leprosy in India, **53**, 278 (Apr. 81)

R81G112. A controlled study of effect of a domiciliary tuberculosis chemotherapy programme in a rural community in south India.

J. Frimodt-moller, G. S. Acharyulu &
Kesava Pillai

The Madanapalle Tuberculosis Research
Unit, West Madanapalle.

Indian J. of Medical Research, **73**, Suppl
(Apr. 81).

G113. Epidemiological characterization of untypable Vi-strains (S) of *Salmonella typhi*.

Tomasekhar & K. B. Sharma*

Salmonella Phage Typing Centre, Department of Microbiology, Lady Hardinge Medical College, New Delhi-110 001.

Indian J. of Medical Research, **73**, 821 (Apr. 81)

G114. Evaluation of fluorescent microscopy for detection of *Mycobacterium leprae*.

Hardas & V. Lele

Department of Microbiology, Government Medical College, Nagpur-440 003.

Leprosy in India, **53**, 273 (Apr. 81)

G115. Haemolysin production among *Escherichia coli* strains isolated from clinical cases of man and animals.

Amim Ahmed & J. N. S. Yadava

Division of Microbiology, Central Drug Research Institute, Lucknow-226 001.

Indian Veterinary Medical J., **44**, 149 (Dec. 80)

G116. Knowledge about leprosy among leprosy patients.

Dasu Raj, B. R. Garg and S. Lal

Department of Dermatology and STD, Jawaharlal Institute of Postgraduate Medical Education and Research, Pondicherry-605 006.

Leprosy in India, **53**, 226 (Apr. 81)

R81G117. Multi-drug treatment for reactions in leprosy.

E. M. Abdul Razack & Asfa Zahra

Department of Dermatology, Tirunelveli Medical College, Tirunelveli-11, Tamil Nadu.

Leprosy in India, **53**, 204 (Apr. 81)

R81G118. Multiple drug therapy-A comparative study with 2 tier and 3 tier combination of rifampicin, clofazimine DDS, INAH and thiace-tazone in lepromatous cases.

S. K. Kundu, S. Ghosh, S. Hazra and S. Chaudhury

Department of Leprology, School of Tropical Medicine, Calcutta-700 073.

Leprosy in India, **53**, 248 (Apr. 81)

R81G119. Permeability of *Mycobacterium leprae* to dapsone: Alteration by purification procedures.

K. Prabhakaran, E. B. Harris & W. F. Kirchheimer

Biochemistry Research Department, U. S. Public Health Service Hospital, Carville, Louisiana-70721, U.S.A.

Leprosy in India, **53**, 160 (Apr. 81)

R81G120. Psychological reaction to leprosy.

P. B. Behere

Department of Psychiatry, Institute of Medical Sciences, Banaras Hindu University, Varanasi.

Leprosy in India, **53**, 266 (Apr. 81)

R81G121. Synthesis and antibacterial activity of metallic complexes of sulphadimethoxine.

S. C. Chaturvedi, S. H. Mishra, K. L. Bhargava & Shobha Kothari

Department of Pharmacy, Holkar Science College, Indore.

Science & Culture, **46**, 401 (Nov. 80)

R81G122. Synthesis of chalcones from 2-hydroxy-3-bromo-4-n-propoxy-5-nitroacetophenone as antibacterial agents.

N. J. Shah, L. C. Jhaveri & H. B. Naik

Department of Chemistry, M. R. Science Institute, Gujarat College, Ahmedabad-380 006.

J. of the Indian Chemical Society, **LVIII**, 300 (Mar. 81)

R81G123. Synthesis of new heterocyclic sulphonamides.

M. A. El-Maghraby & A. E. Hassan

Chemistry Department, Faculty of Science, Aswan University, Aswan, Egypt.

Indian J. of Chemistry, **20B**, 256 (Mar 81)

R81G124. A study of cell mediated immunity in leprosy.

G. K. Dubey, V. K. Joglekar, U. D. Hardas, and B. S. Chaubey

Government Medical College & Hospital, Nagpur.

Leprosy in India, **53**, 197 (Apr. 81)

R81G125. Treatment of leprosy: immunologic considerations. Editorial.

B. R. Chatterjee

Leprosy in India, **53**, 142 (Apr. 81)

R81G126. Tuberculosis in children: Involvement of paratracheal lymph nodes.

D. N. Chatterji

Chittaranjan Seva Sadan, College of Obstetrics, Gynaecology & Child Health, Chittaranjan Sishu Sadan, Calcutta.

J. of the Indian Medical Association, **76**, (1 Feb. 81)

R81G127. Typhoid fever due to chloramphenicol resistant *Salmonella typhi* associated with R-plasmid.

K. C. Agarwal, B. P. Panhotra, Mahanta, V. K. Arya & R. K. Garg

Department of Microbiology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, (Apr 81)

Parasitic

R81G128. Acid and alkaline phosphatases of *Plasmodium knowlesi*.

H. S. Banyal, V. C. Pandey & C. Dutta

Division of Microbiology, Central Research Institute, Lucknow-226 001.

Indian J. of Parasitology, **4**, 127 (Dec. 81)

**G129. Age-associated responses
susceptible and resistant rats to
infection with *Fasciola hepatica*.**

R. Rajasekariah & M. J. Howell
a-Geigy Research Centre, Goregaon
t, Bombay-400 063.

International J. for Parasitology, **11**, 59
(b. 81)

**G130. Anaerobic bacteria in
chronic suppurative otitis media.**

Ayyagari, V. K. Pancholi, S. C.
ndhi, A. Goswami, K. C. Agarwal &
N. Mehra

Department of Medical Microbiology,
Postgraduate Institute of Medical Educa-
tion and Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 860
(June 81)

**G131. Attempts to establish
Wuchereria bancrofti in laboratory animals.**

h. Krishna Rao, K. P. Dey, M. Venka-
narayana, T. G. Ravindranathan, Ram
ahai, P. K. M. Menon & D. Subrah-
manyam

National Institute of Communicable
Diseases, 22 Shamnath Marg, Delhi-110 054.

J. of Communicable Diseases, **12**, 219
(Dec. 80)

**G132. Control of bancroftian
filariasis with common salt medicated
with diethyl carbamazine in
Lakshadweep.**

C. K. Rao, P. Panduranga Rao, S.
Russel, K. R. Hamzakoya, A. Chandra-
sekharan, S. P. Roychowdhury & Ch.
Krishna Rao

National Institute of Communicable
Diseases, 22 Shamnath Marg, New Delhi-
110 054.

Indian J. of Medical Research, **73**, 865
(June 81)

**R81G133. Chemotherapeutic response
of the antigenic variant of *Plasmo-
dium knowlesi* in *Macaca mulatta*.**

P. P. Singh, S. K. Puri & G. P. Dutta

Division of Microbiology, Central Drug
Research Institute, Lucknow-226 001.

Indian J. of Parasitology, **4**, 191 (Dec. 80)

**R81G134. Detection & diagnostic
utility of exoantigen of *Wuchereria
bancrofti* microfilariae.**

Indira Kharat, P. Kaliraj, S. N. Ghirnikar
& B. C. Harinath

Department of Biochemistry, M. G.
Institute of Medical Sciences, Sevagram,
Wardha-442 102.

Indian J. of Experimental Biology, **19**, 564
(June 81).

**R81G135. Disappearance of some
Brugia malayi foci from Madhya
Pradesh, Orissa and Tamil Nadu and
co-existence of Malayan and bancro-
ftian filariasis in some pockets.**

S. Russel, A. Ramalingeswara Rao, J. M.
Khamre, B. C. Praharaj & C. K. Rao

National Institute of Communicable
Diseases, 22 Sham Nath Marg, Delhi-
110 054.

J. of Communicable Diseases, **12**, 183
(Dec 80)

R81G136. Effect of diethylcarbamazine medicated common salt on *Wuchereria bancrofti* prophylaxis.

P. Krishna Rao, M. Venkatanarayana, M. V. V. L. Narasimham & C. K. Rao

Regional Filaria Training & Research Centre, National Institute of Communicable Diseases, Rajahmundry-533 104.

J. of Communicable Diseases, 12, 205 (Dec. 80)

R81G137. Effect of diethylcarbamazine on *Wuchereria bancrofti* microfilarial enzymes.

B. Chandrashekar, S. N. Ghirnikar & B. C. Harinath

Department of Biochemistry, Mahatma Gandhi Institute of Medical Sciences, Sevagram-442 102.

Indian J. of Biochemistry & Biophysics, 18, 139 (Apr. 81)

R81G138. Effect of glucose on the survival of rats infected with *Trypanosoma evansi*.

P. D. Juyal & H. C. Tewari

Department of Parasitology, G. B. Pant University of Agriculture & Technology, Pantnagar.

Indian J. of Parasitology, 4, 205 (Dec. 80)

R81G139. Effect of temperature on survival and infectivity of larvae of *Nippostrongylus brasiliensis* and *Nematospiroides dubius*.

A. Misra & J. C. Katiyar

Division of Parasitology, Central Research Institute, Lucknow-226 001

Indian J. of Parasitology, 4, 195 (Dec. 80)

R81G140. Evaluation of different culture media for isolation of *Leishmania donovani*.

Lakshmi Srivastava, V. K. Srivastava & J. C. Suri

National Institute of Communicable Diseases, 22, Sham Nath Marg, Delhi-110 054.

J. of Communicable Diseases, 12, (Dec. 80)

R81G141. Histochemical localization of carbohydrate in the innervation of microfilariae of *Brugia malayi*.

P. K. Murthy, P. S. R. Murthy & A. B. Sen

Division of Parasitology, Central Research Institute, Lucknow-226 001

Indian J. of Parasitology, 4, 237 (Dec. 80)

R81G142. Intestinal parasites among slum dwellers in Madras.

K. M. Veerannan

Water Analysis Department, King Institute, Guindy, Madras-600 032.

Indian J. of Environmental Health, 23, (Apr. 81)

G143. Macrophage migration inhibition and skin reaction in guinea pigs immunized with *Entamoeba histolytica* antigen.

her, M. U. Siddiqui & Sohail Ahmed
sitology Division, Department of
robiology, Jawaharlal Nehru Medical
ege, Aligarh Muslim University,
arh-202 001.

an J. of Parasitology, **4**, 145 (Dec. 80)

G144. Pathogenicity in mice of strains of *Acanthamoeba culbertsoni* (Singh and Das, 1970) and *A. rhysodes* (Singh, 1972) from Indian soils and the present status of the genera *Hartmannella* and *Acanthamoeba*.

Misra & A. K. Sharma

Division of Microbiology, Central Drug
Research Institute, Lucknow-226 001.

Can. J. of Parasitology, **4**, 135 (Dec. 80).

1G145. Polyamines of helminths.

K. Srivastava, T. K. Roy & O. P. Mukla

Division of Biochemistry, Central Drug
Research Institute, Lucknow-226 001.

Indian J. of Parasitology, **4**, 187 (Dec. 80)

1G146. Possible anthelmintic agents: Synthesis of ethyl 5(6)-[5(6)-substituted-2-benzimidazolyl]benzimidazole-2-carbamates & ethyl 6-dinitro-5-substituted-amino benzimidazole-2-carbamates.

Raduri*

Medicinal Chemistry Division, Central
Drug Research Institute, Lucknow-
226 001.

Indian J. of Chemistry, **20B**, 254 (Mar 81)

R81G147. Prevalence of hookworm in some villages around Nagpur.

P. V. R. C. Panicker, A. S. Gadkari,
S. W. Kulkarni, B. K. Handa & M. W.
Joshi

National Environmental Engineering
Research Institute, Nagpur-440 020.

J. of Communicable Diseases, **12**, 192
(Dec. 80)

R81G148. Progress of UNDP/World Bank/WHO special programme for research and training in tropical diseases-1979-80 TDR excerpts from TDR-STAC-2/80 : 3.

C. K. Rao

National Institute of Communicable Diseases, 22 Shamnath Narg, New Delhi-110 054.

J. of Communicable Diseases, **12**, 222
(Dec. 80)

R81G149. Sequential changes in leucocytes of cats during infection with subperiodic *Brugia malayi*.

P. K. Murthy, T. K. Roy Chowdhury &
A. B. Sen

Division of Parasitology, Central Drug
Research Institute, Lucknow-226 001.

Indian J. of Parasitology, **4**, 233 (Dec. 80)

R81G150. Succinate dehydrogenase and fumarate reductase activity in *Aspiculuris tetraptera* and *Ascaris suum* and the effect of the anthelmintics cambenazole thiabendazole and levamisole.

J. C. W. Comley & D. J. Wright

Imperial College Field Station, Ashurst Lodge, Ascot, Berkshire, England.

International J. for Parasitology, **11**, 79 (Feb. 81)

R81G151. Synthesis of substituted thiocarboxamides carboxamide & thioureas as potential anthelmintic & antimicrobial agents.

S. Abuzar & S. Sharma*

Medicinal Chemistry Division, Central Drug Research Institute, Lucknow-226 001

Indian J. of Chemistry, **20B**, 230 (Mar. 81)

R81G152. Antifungal activity of some novel lanthanon thiosemicarbazone complexes.

S. P. Mital, S. K. Sharma, R. V. Singh & J. P. Tandon

Department of Chemistry, University of Rajasthan, Jaipur-302 004.

Current Science, **L**, 483 (5 June 81)

R81G153. Antifungal action of hydroxyl- & methyl-substituents to a benzene ring.

A. K. Samanta & S. K. Bose*

Department of Biochemistry, University College of Sciences, 35, Ballyganj Circular Road, Calcutta-700 019.

Indian J. of Experimental Biology, **19**, 5 (June 81)

R81G154. Beta haemolytic streptococcal throat carriage in a rural population of Lucknow.

V. K. Srivastava, S. K. Agarwal, M. Chandra, V. Narayan & J. V. Singh

Upgraded Department of Social & Preventive Medicine, K. G. Medical College, Lucknow-226 003.

Indian J. of Medical Research, **73**, 8 (June 81)

R81G155. Chemical modification of some peptide antibiotics in relation to their biological activities.

P. C. Banerjee & S. Sengupta

Indian Institute of Experimental Medicine, Calcutta-700 032.

J. of Scientific & Industrial Research, **4**, 246 (Apr. 81)

R81G156. Dose determination with temephos against *Anopheles stephensi* Liston in wells.

S. C. Tewari, R. Reuben & C. P. Batra

Vector Control Research Centre, 5/A, Lenin Street, Kosapalayam, Pondicherry-605 011.

Indian J. of Medical Research, **73**, 8 (June 81)

R81G157. Enteropathogenicity of *Salmonella typhimurium*.

R. Panhotra, J. Mahanta & K. C. Agarwal*

Department of Medical Microbiology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 847 (June 81)

R81G158. Isolation of new phages of *Staphylococcus aureus* and evaluation of their typing potentialities.

Rajesh Bhatia, R. Natarajan & D. S. Agarwal*

Department of Microbiology, Maulana Azad Medical College, New Delhi-110 002.

Indian J. of Medical Research, **73**, 842 (June 81)

R81G159. Isolation and identification of lysogenic phages from untypable strains of *Salmonella typhi*.

G. Somasekhar & K. B. Sharma*

Department of Microbiology, Lady Hardinge Medical College, New Delhi-110 001.

Indian J. of Medical Research, **73**, 836 (June 81)

R81G160. Modification of antifungal activity of econazole in presence of betamethazone.

Ketan Shah, Shailaja Rao, Bipin Nair & V. V. Modi*

Department of Microbiology, Faculty of Science, M. S. University, Baroda-390 002.

Indian J. of Medical Research, **73**, 965 (June 81)

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D. A. J. Tyrrell

Division of Communicable diseases, MRC Clinical Research Centre, Harrow, Middlesex HA1 3UJ, U.K.

J. of the Royal Society of Medicine, **74**, 145 (Feb. 81)

R81G162. Resistance to *Mycobacterium tuberculosis* H₃₇ Rv infection induced by *Listeria* and mycobacterial lipids.

M. Mara, J. Pruchora, C. John, P. Smerak & Z. Sir

Laboratory of Special Medical Microbiology & Immunology, Faculty of Medicine, Charles University, 12800 Prague 2.

Folia Microbiologica, **26**, 52 (1981)

R81G163. Synthesis of some quinazolones as antiamebic agents.

V. S. Misra, V. K. Saxena & P. Shah

Department of Chemistry, Lucknow University, Lucknow-226 007.

Indian Drugs, **18**, 276 (May 81)

R81G164. Treatment of leprosy.

Surrinder Kaur & Bhushan Kumar

Department of Dermatology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Drugs Bulletin, **4**, 1 (Apr .81)

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R81H041. Circulating immune complexes in cervical cancer: Simple method for detection and characterisation.

P. Seth & R. V. Srinivas

Dept. of Microbiology, All India Institute of Medical Sciences, New Delhi-110 029, India.

Indian J. of Medical Research, **73**, 926 (Jun. 81)

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H. Nakano, Y. Matsuda, K. Ito, S. Ohkubo, M. Morimoto & F. Tomita

Tokyo Research Laboratory, Kyowa Hakko Kogyo Co Ltd., Machida, Tokyo, Japan.

J. of Antibiotics, **34**, 266 (Mar. 81)

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K. Takahashi, M. Yoshida, F. Tomita & K. Shirahata

Tokyo Research Laboratory, Kyowa, Hakko Kogyo Co. Ltd. Machida, Tokyo, Japan.

J. of Antibiotics, **34**, 271 (Mar. 81)

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P. K. Roy & M. Seshadri

Dept. of Surgery & Microbiology, The Medical College of Pennsylvania & Hospital, 3300 Henry Avenue, Philadelphia, PA 19129, USA.

Indian J. of Experimental Biology, **19**, 40 (May 81)

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M. S. Chapekar & M. B. Sahasrabudhe

Dept. of Pathology, Arlington Hospital, N. George Mason Drive Arlington, VA, USA.

Indian J. of Experimental Biology, **19**, 33 (Apr. 81)

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I. Umezawa, H. Takeshima, K. Komiyama, Y. Koh, H. Yamamoto & M. Kawaguchi

The Kitasato Institute, Shirokane Minato-ku, Tokyo, Japan.

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Saha & D. K. Roy

Dept. of Pharmacy, Jadavpur University, Calcutta-700 032.

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R81I104. Bioavailability of chloramphenicol in the white leghorn *Gallus domesticus*.

S. Paul, R. C. Gupta & K. J. Verma

Dept. of Pharmacology, Punjab Agricultural University, Ludhiana-141 004.

Indian J. of Experimental Biology, **19**, 363 (Apr. 81)

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Y. S. Shin-Buehring, L. Stuenkel, E. Pouget, P. Raham, & J. Schaub

Children's Hospital, University of Munich, Munich, Federal Republic of Germany.

Clinica Chimica Acta, **112**, 257 (28 May 81)

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O. P. Nangia & S. S. Sukhija

Dept. of Physiology & Pharmacology, Haryana Agricultural University, Hissar 125 004.

Indian J. of Experimental Biology, **19**, 475 (May 81)

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R. Bansal, S. Singh & J. R. Kidwai

Dept. of Biochemistry, Central Drug Research Institute, Lucknow-226 001.

Indian J. of Biochemistry & Biophysics, **18**, 110 (Apr. 81)

R81I108. Determination of 5'-nucleotidase by automated ion-exchange column chromatography.

S. S. Chen* & D. Hsu

Dept. of Obstetrics & Gynaecology, Long Island, Jewish-Hillside Medical Centre, New Hyde Park, NY 11042, USA.

J. of Chromatography, **210**, 186 (29 May 81)

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S. D. Belsare

School of Biological Sciences, Bhopal University, Bhopal-462 026.

Indian J. of Experimental Biology, **19**, 506 (May 81)

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R. M. Gaffney & J. R. Casley-smith

Electron Microscope Unit, University of Adelaide, South Australia.

J. of Pathology, **133**, 229 (Mar. 81)

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J. R. Casley-Smith & R. M. Gaffney

Electron Microscope Unit, University of Adelaide, South Australia.

J. of Pathology, **133**, 243 (Mar. 81)

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R. C. Srivastava & S. Yadav

Chemistry Dept., Birla Institute of Technology & Science, Pilani-333 031.

Indian J. of Biochemistry & Biophysics, **18**, 155 (Apr. 81)

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T. E. Nicholas, M. E. Jones, D. V. Johnson & G. Phillipou

Dept. of Human Physiology and Human Morphology, The Finders University, South Australia, Australia.

J. of Steroid Biochemistry, **14**, 45 (Jan. 81)

R81I114. Pharmacological immunosuppression in organ transplantation.

B. Bhushan, I. P. Narang & R. V. S. Yadav

Renal Transplant Section, Dept. of Surgery, Postgraduate Institute of Medical Education and Research, Chandigarh-160 012.

Drugs Bulletin, **4**, 34 (Apr. 81)

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B. I. Naik & S. K. Srivastava

Biochemistry Department, M. S. University of Baroda, Baroda.

Indian J. of Experimental Biology, **19**, 47 (May 81)

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I. Margineanu & V. Ghetie

Dept. of Immunology, Victor Babes Institute, Spl. Independentei 99-101, Bucharest 76201, Romania.

J. of Theoretical Biology, **90**, 101 (7 May 81)

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S. Mehta, C. K. Nain, B. Sharma & V. S. Mathur

Dept. of Paediatrics, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 538 (Apr. 81)

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W. L. Duax, G. David Smith, D. C. Swenson & others

Medical Foundation of Buffalo, Inc. 73 High Street, Buffalo, New York 14203, USA.

J. of Steroid Biochemistry, **14**, 1 (Jan. 81)

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B. P. Jaju & Y. P. Srivastava

Dept. of Pharmacology & Therapeutics, BRD Medical College, Gorakhpur-273 308.

Indian J. of Experimental Biology, **19**, 367 (Apr. 81)

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R. T. Parmley, J. C. Barton & others

Institute of Dental Research, Dept. of Pediatrics and Pathology, Birmingham, Alabama 35294.

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F. E. Cohen, M. J. E. Sternberg & W. R. Taylor

Laboratory of Molecular Biophysics, Dept. of Zoology, South Parks Road, Oxford, OX1 3PS, England.

J. of Molecular Biology, **148**, 253 (25 May 81)

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H. Kyle Webster & J. M. Whaun

Dept. of Hematology, Division of Medicine, Walter Reed Army Institute of Research, Washington DC, 20012, USA.

J. of Chromatography, **209**, 283 (May 81)

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B. Y. Klein

The Hebrew University, Hadassah Medical School, Jerusalem, Israel.

J. of Theoretical Biology, **90**, 199 (21 May 81)

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Dept. of Molecular Biology and Genetics, Institute of Microbiology, Czechoslovak Academy of Sciences, 14220, Prague 4.

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Dept. of Biochemistry, Indian Institute of Science, Bangalore-560 012.

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N. A. Troitsky & S. E. Dromashko

Institute of Genetics and Cytology, Academy of Sciences of the BSSR, Minsk, USSR.

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H. M. Krisch & G. B. Selzer

Dept. de Biologie Moleculaire Universite de Geneve, 30, Quai Ernest Ansermet 1211 Geneve 4, Switzerland.

J. of Molecular Biology, **148**, 199 (15 May 81)

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M. Konickova-radochova & J. Konicek

Dept. of Molecular Biology and Genetics, Institute of Microbiology, Czechoslovak Academy of Sciences, 14220, Prague 4.

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S. Alwan, H. J. Smith*, M. Mahbouba, J. C. Evans & P. H. Morgan

Welsh School of Pharmacy, University of Wales, Institute of Science and Technology, Cathays Park, Cardiff CF1 3NU, U. K.

J. of Pharmacy & Pharmacology, **33**, 323 (May 81)

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J. F. Anderson, M. G. Grutter, S. J. Remington, L. H. Weaver & B. W. Matthews*

Institute of Molecular Biology and Dept. of Physics, University of Oregon, Eugene, OR 97403, USA.

J. of Molecular Biology, **147**, 523 (Apr. 81)

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M. Vijayaraj Reddy & T. M. Jacob

Dept. of Biochemistry & ICMR Centre for Cell Biology and Genetics, Indian Institute of Science, Bangalore-560 012.

Current Science, **L**, 308 (5 Apr. 81)

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J. C. Kraak, C. X. Ahn & J. Fraanje

Laboratory for Analytical Chemistry, University of Amsterdam, Nieuwe Achtergracht 166, Amsterdam, The Netherlands.

J. of Chromatography, **209**, 369 (22 May 81)

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J. E. MacCarthy, & J. J. Kozak

Program in Biophysics and Biochemistry and Radiation Laboratory, University of Notre Dame, Notre Dame, Indiana 46556, USA.

J. of Theoretical Biology, **90**, 265 (21 May 81)

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H. L. Behm & J. G. Wagner*

Upjohn Centre for Clinical Pharmacology, The University of Michigan, Ann Arbor, MI 48109, USA.

J. Pharmacy & Pharmacology, **33**, 283 (May 81)

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J. Brosius, T. J. Dull, D. D. Sleeter & H. F. Noller

Thimann Laboratories, University of California, Santa Cruz, CA 95064, USA.

J. of Molecular Biology, **148**, 107 (5 May 81)

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M. Ray & S. Ray

Dept. of Botany, Visva-Bharati, Santiniketan, West Bengal.

Science & Culture, **47**, 45 (Jun. 81)

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A. Sancar, R. P. Wharton, S. Seltzer, B. M. Kacinski, N. D. Clarke & W. D. Rupp

The Dept. of Therapeutic Radiology and Molecular Biophysics and Biochemistry, Yale University School of Medicine, New Haven, Conn 06510, USA.

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A. Sancar, N. D. Clarke, J. Griswold, W. J. Kennedy & W. D. Rupp

The Dept. of Therapeutic Radiology, and Molecular Biophysics and Biochemistry, Yale University School of Medicine, New Haven, Conn. 06510, USA.

J. of Molecular Biology, **148**, 63 (5 May 81)

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T. J. Case & E. A. Bender

University of California, Dept. of Biology, San Diego, La Jolla, CA 92093, USA.

J. of Theoretical Biology, **90**, 181 (21 May 81)

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S. Dutta

Biophysics Laboratory, Physics Department, University College of Science, A. P. G. Road, Calcutta-700 009.

Current Science, **L**, 314 (5 Apr. 81)

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J. Konicek, G. Y. Darasella, M. Konikova Radochova

Dept. of Molecular Biology and Genetics, Institute of Microbiology, Czechoslovak Academy of Sciences, 14220, Prague 4.

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Dept. of Microbiology and Molecular Genetics, Harvard Medical School, Shattuck Street Boston, Mass 021 USA.

J. of Molecular Biology, **148**, 1 (5 May 81)

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A. L. Dounce

The University of Rochester, School of Medicine and Dentistry, Rochester, New York 14642, USA.

J. of Theoretical Biology, **90**, 63 (7 May 81)

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Belmont & C. Nicolini

Dept. of Biophysics and Physiology, Temple University, H. S. G. Philadelphia, PA 19140, USA.

J. of Theoretical Biology, **90**, 169 (21 May 81)

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M. Perez-bolanos & L. Yarzabal

Dept. de Genetica Molecular, Centro Nacional de Investigaciones Cientificas, Havana, Cuba.

Experimental Mycology, **5**, 15 (Mar. 81)

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S. Svetina

Institute of Biophysics Medical Faculty and J. Stefan Institute, Edvard Kardelji University of Ljubljana, 61105 Ljubljana, Lipiceva 2, Yugoslavia.

J. of Theoretical Biology, **90**, 151 (7 May 81)

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R. Menzel & J. Roth

Dept. of Biology, University of Utah, Salt Lake City, Ut. 84112, USA.

J. of Molecular Biology, **148**, 21 (5 May 81)

R81J176. Relation between hen egg white lysozyme and bacteriophage T₄ lysozyme: Evolutionary implications.

B. W. Matthews, S. J. Remington, M. G. Grutter & W. F. Anderson

Institute of Molecular Biology and Dept. of Physics, University of Oregon, Eugene, OR 97403, USA.

J. of Molecular Biology, **147**, 545 (Apr. 81)

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J. A. Meijers, K. C. Winkler, E. E. Stobberingh & Schrauwen, P. P.

Laboratory of Microbiology, State University of Catharijneringel 59, 3511 GG Utrecht, The Netherlands.

J. of Medical Microbiology, **14**, 21 (1 Feb. 81)

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B. Grant

Dept. of Biology, The College of William and Mary Williamsburg, VA 23185, USA.

J. of Theoretical Biology, **90**, 149 (7 May 81)

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R. Treisman & R. Kamen

Transcription Laboratory, Imperial Cancer Research Fund, PO Box 123, Lincolns Inn Fields, London WC2A 3PH, England.

J. of Molecular Biology, **148**, 273 (25 May 81)

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A. N. Chakrabarty, M. Sen, T. S. Balganesch & S. G. Dastidar

Dept. of Pathology & Bacteriology, University College of Medicine, Calcutta University, Calcutta-700 020.

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B. R. Panhotra, J. Mahanta, R. K. Garg & K. C. Agarwal*

Dept. of Microbiology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 489 (Apr 81)

K PHARMACEUTICS**R81K135. Analysis of moisture sorption hysteresis in hard gelatin capsules, maize starch and maize starch: drug powder mixtures.**

P. York

Industrial Pharmacy Unit, School of Pharmacy, University of Bradford, Bradford BD7 108, U. K.

J. Pharmacy and Pharmacology, **35**, 269 (May 81)

R81K136. Apparent diffusion coefficient of sodium phenobarbitone in ethylcellulose microcapsules: effect of capsule size.

R. Senjkovic & I. Jalsenjak*

Faculty of Pharmacy and Biochemistry, University of Zagreb, Domagojeva 2 41000 Zagreb, Yugoslavia.

J. of Pharmacy & Pharmacology, **33**, 279 (May 81)

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K. S. Uppal, D. G. Panse, B. V. Bapat & B. B. Ghatge

National Chemical Laboratory, Pune-411 008.

Indian J. of Technology, **19**, 195 (May 81)

R81K138. Biopharmaceutical evaluation in man of chlorpropamide products marketed in India.

S. P. Manek, H. P. Tipnis, B. S. Doshi & R. D. Kulkarni

Bombay College of Pharmacy, Kalina, Bombay.

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A. F. Casy

School of Pharmacy & Pharmacology, University of Bath, Claverton Down, Bath, BA 27 AY, UK.

J. of Pharmacy & Pharmacology, **33**, 333 (May 81)

R81K140. Bioavailability of chloramphenicol in presence of vitamin C and vitamin B complex.

A. Omray & K. C. Varma

Ranbaxy Laboratories Ltd., Okhla, New Delhi-110 020.

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R81K141. The chemistry of the diacetyl monoxime assay of urea in biological fluids.

A. R. Butler, I. Hussain & E. Leitch

Dept. of Chemistry, The University of St. Andrews, Fife KY 9ST, Scotland.

Clinica Chimica Acta, **112**, 357 (28 May 81)

R81K142. Colorimetric estimation of iodochlorohydroxy quinoline (ICHO) diiodohydroxyquinoline (DIHQ) and dibromohydroxyquinoline (DBHQ).

R. T. Sane, A. B. Ambardekar & V. K. Shastri

Ramnarain Ruia College, Matunga, Bombay-400 019.

Indian Drugs, **18**, 290 (May 81)

R81K143. Concentration of vitamin B_{12} by ultrafiltration.

R. Rangarajan, N. V. Desai & A. V. Rao

Division of Chemistry, National Research Council, Ottawa KIA OR9, Canada.

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D. K. S. Chauhan & R. N. Singh

Dept. of Pharmacology, State Ayurvedic College, Lucknow-226 004.

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P. V. Sharma

Dept. of Dravyaguna, Faculty of Indian Medicine, Banaras Hindu University, Varansai-221 005.

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U. S. Gogate, S. P. Manek & H. P. Tipnis

Bombay College of Pharmacy, Kalina, Bombay-400 029.

Indian Drugs, **18**, 265 (May 81)

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M. Panigrahi & Ch. D. P. Rao

Regional Research Laboratory, Bhubaneswar.

Indian J. of Technology, **19**, 14 (Jan. 81)

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D. A. Seamark, D. J. H. Trafford & H. L. Makin*

Steroid Laboratory, Dept. of Chemical Pathology, The London Hospital Medical College, Turner Street, London E1 2AD, England.

J. of Steroid Biochemistry, **14**, 111 (Jan. 81)

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J. Rosenfeld, T. L. Ting, & A. Phatak

Dept. of Pathology, McMaster University Medical Centre, Hamilton, Ontario, Canada L8N 3Z5.

Prostaglandins, **21**, 41 (Jan. 81)

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R. T. Sane, C. H. Thombare, P. G. Anaokar & A. D. Pandit

Ramnarain Ruia College, Matunga, Bombay-400 019.

Indian Drugs, **18**, 295 (May 81)

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Y. Hayashi

Dept. of Clinical Pathology, University of Juntendo School of Medicine, Tokyo, Japan

Japanese J. of Antibiotics, **34**, 440 (Mar. 81)

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S. Singh, M. Khanna & J. P. S. Sarin

Division of Pharmaceutics, Central Drug Research Institute, Lucknow-226 001.

Indian Drugs, **18**, 207 (Mar. 81)

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O. Kobayashi & K. Matsui

Division of Biology, Research Institute for Atomic Energy, Osaka City University, Sumiyoshiku, Osaka 558, Japan.

J. of Chromatography, **210**, 150 (29 May 81)

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N. M. Sanghvi, N. G. Joshi & K. S. Dubal

Dept. of Chemical Technology, Matunga,
Bombay-400 019.*Indian Drugs*, **18**, 299 (May 81)**R81K155. Methods for analysis of diethyl carbamazine citrate.**Miss L. Bhanumathi, S. G. Wadodkar &
A. V. KastureDept. of Pharmaceutical Sciences, Nag-
pur University Campus, Nagpur-440 010.*Indian Drugs*, **18**, 204 (Mar. 81)**R81K156. A note on the colorimetric determination of benzocaine in pharmaceuticals.***Indian Drugs*, **18**, 218 (Mar. 81)**R81K157. Optimization in thin-layer chromatography some practical considerations.**A. N. Siouffi, F. Bressolle & G. Guiochon
Laboratoire de Chimie Appliquee,
Universite d' Aix-Marseille III, Centre
de Saint Jerome, Rue Henri Poincare,
F-13397 Marseille Codex 4, France.*J. of Chromatography*, **209**, 129 (May 81)**R81K158. Partial purification of microsomal proteolipid (s) from *Neurospora crassa* by high-performance liquid chromatography on silica gel.**W. B. Macklin, L. Pickart & D. W.
WoodwardDept. of Biological Sciences, Stanford
University, Stanford, CA 94305, USA.*J. of Chromatography*, **210**, 174 (29 May
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R. S. Bockman

Dept. of Calcium Metabolism, Memorial
Sloan-Kettering Cancer Centre, New
York 10021, USA.*Prostaglandins*, **21**, 9 (Jan. 81)**R81K160. Radioimmunoassay of rabbit luteinizing hormone during pregnancy and following immunization with homologous antibodies to ovine LH.**

D. D. Vakharia & A. R. Sheth*

Institute for Research in Reproduction,
Jehangir Merwanji Street, Bombay-
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MahadevappaDept. of Post-graduate Studies & Research
in Chemistry, University of Mysore,
Manasagangotri, Mysore-570 006.*J. of the Indian Chemical Society*, **LVIII**, 619
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D. M. Shingbal & S. D. Naik

Pharmaceutical Research Laboratory,
Goa College of Pharmacy, Panaji,
Goa-403 001.

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M. F. Jones

Pharmacy Dept., Manchester Royal Infirmary, Oxford Road, Manchester, M13 9WL, England.

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S. P. Jindal, T. Lutz, C. Hallstrom & P. Vestergaard

Rockland Research Institute, Orangeburg, New York 10962, USA.

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R. Manavalan & B. M. Mithal

Dept. of Pharmacy, Birla Institute of Technology & Science, Pilani, Rajasthan.

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S. D. Shukla & A. K. Vaish

Chemistry Department, Lucknow University, Lucknow.

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V. N. Gupta, R. Manavalan & C. Atal

Regional Research Laboratory, Jamnagar, Tawi-180 001.

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J. Knuutinen

Dept. of Chemistry, University of Jyväskylä, SF-40100 Jyväskylä 10, Finland.

J. of Chromatography, **209**, 446 (22 May 81)

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K. Chou

Shanghai Institute of Biochemistry, Chinese Academy of Sciences, 320 Yang Road, Shanghai 200031, China.

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Z. Stanczyk & U. Goebelsmann*

Los Angeles County-University of Southern California, Medical Centre, Women's Hospital, Room 1M2, 1240 North Mission Road, Los Angeles, California 90033, USA.

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Nasima Khan & D. P. Chakraborty

Department of Chemistry, Bose Institute, Calcutta-700 009.

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G. S. Grover & J. Tirumala Rao

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M. B. Gupta, R. Nath, G. P. Gupta & K. P. Bhargava*

Department of Pharmacology and Therapeutics, K. G.'s Medical College, Lucknow-226 003.

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Institut für Organische Chemie und Biochemie der Universität Hamburg, Martin-Luther-King-Platz 6, D-2000 Hamburg 13.

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Institut für Organische Chemie und Biochemie der Universität Hamburg, Martin-Luther-King-Platz 6, D-2000, Hamburg 13.

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T. Kozawa, K. Sakai, M. Uchida, T. Okuyama & S. Shibata

Department of Molecular Pharmacology, Meiji College of Pharmacy, 1-35-23 Nozawa, Setagayaku, Tokyo 154 Japan.

J. Pharmacy & Pharmacology, **33**, 317 (May 81)

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G. C. S. Reddy, K. N. N. Ayengar & S. Rangaswami*

IDL Chemicals Limited, P. B. No. 1, Sanatnagar (IE) PO, Hyderabad-500 018.

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S. P. Dhoubhadel & Griha Man Singh

Department of Chemistry, Tribhuvan University, Kiripur, Kathmandu, Nepal.

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Department of Chemistry, University of Rajasthan, Jaipur-302 004.

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P. Arantha Reddy & G. S. Krishna Rao

Department of Organic Chemistry, Indian Institute of Science, Bangalore 560 012.

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B. N. Singh

Department of Dravyaguna, State Ayurvedic College, Lucknow University, Lucknow-226 004.

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Department of Raja-Shastra, Institute of Medical Sciences, Banaras Hindu University, Varanasi-221 005.

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Central Institute of Medicinal & Aromatic Plants, Lucknow-226 010.

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Regional Research Laboratory, Jorhat, Assam.

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Department of Chemistry, The University of Exeter EX4 4QD.

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T. A. More

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Science & Culture, 45, 428 (Dec. 80)

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H. S. Ramsdell & D. R. Buhler

Environmental Health Sciences Centre, Oregon State University, Corvallis, OR 97331, USA.

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Istituto Chimica Organica ed Analitica, Via Celoria 2, 20133 Milan, Italy.

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Department of Botany, Government College of Science, Raipur-492 002.

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G. R. Nambiar & A. R. Mehta

Tissue Culture Laboratory, Department of Botany, M. S. University of Baroda, Baroda-390 002.

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M. Behari & S. C. Gupta

Chemical Laboratories, Sri Varshneya College, Aligarh.

Current Science, **L**, 485 (5 June 81)

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A. S. Ding, J. K. Kirtany & S. K. Paknikar*

Centre of Post-graduate Instruction and Research, Panaji-403 001.

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Institut für Organische Chemie, Technische Universität Berlin, Strabe des 17. Juni 135, D-1000, Berlin 12.

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Chemistry Department, Allahabad University, Allahabad-211 002.

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Department of Chemistry, Patna University, Patna-800 005.

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B. Hazra, P. Sur*, B. Sur, A. Banerjee & D. K. Roy

Department of Pharmacy, Jadavpur University, Calcutta-700 032.

J. of the Indian Chemical Society, **LVIII**, (June 81)

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Department of Botany, Ravenshaw College, Cuttack-3.

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Department of Chemistry, The University of Sussex, Brighton, Sussex, BN1 9QJ.

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C. P. Velusamy & G. S. Krishna Rao*

Department of Organic Chemistry, Indian Institute of Science, Bangalore-560 012.

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Y. Sendo, T. Konoike, M. Murkami & M. Yoshioka

Shionogi Research Laboratories, Shionogi & Co. Ltd., Fukushima-ku, Osaka, 553, Japan.

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Department of Chemistry, Osmania University, Hyderabad-500 007.

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A. S. R. Anjaneyulu & D. S. Reddy

Department of Chemistry, Andhra University, Waltair-530 003.

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Pharmaceutical Institute, Tohoku University, Aobayama, Sendai 980, Japan.

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School of Studies in Zoology, Jiwaji University, Gwalior-474 002.

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Sektion Chemie Humboldt-Universität Zu Berlin, DDR.

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K. C. Bhuyan

Department of Statistics, Jehangirnagar University, Dacca.

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M. M. Pandyat

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C. A. Ross

10614-81 Avenue Edmonton, Alberta T6E 1X9, Canada.

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W. L. Stewart†

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D. Vere

Dept. of Therapeutics, The London Hospital Medical College, London.

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Dept. of Psychiatry, Government Medical College, Patiala.

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G. S. Antezana

Drug Policies and Management, WHO Geneva.

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Filliozat†

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Department of Kayachikitsa, Institute of Postgraduate Teaching and Research, Gujarat Ayurvedic University, Jamnagar-361 001.

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Jadhavpur University, Jadhavpur.

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M. M. Pandya†

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A. K. Roychoudhury

Bose Institute, Calcutta-700 009.

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N. S. Galbraith

Communicable Disease Surveillance Centre, Public Health Laboratory Service 61 Colindale Avenue, London NW9 5EQ.

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N. C. Shah

Central Institute of Medicinal and Aromatic Plants, Lucknow.

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Regional Research Centre (Ayurved),
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Department of Science & Technology,
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Institute of Theoretical Sciences, University of Oregon, Eugene, Oregon 974
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T. Siddiqi

Institute of History of Medicine and Medical Research, Tughlaqabad, P. Madangiri, New Delhi-110 062.

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of quinolines and related fused
pyridines. 4. A simple one-pot
route to pyrido (2, 3-b) quinolin-2-
ones from anilides.**

O. Methcohn & B. Tarnowski

University of Salford, Dept. of Chemistry,
& Applied Chemistry, Salford, M54WT,
England.

Tetrahedron Letters, **21**, 3721 (1980)

APPLIED MICROBIOLOGY

**R81R020. A comparison of
unstructured growth models of
microorganisms.**

T. Takamatsu, S. Shioya & K. Okuda
Department of Chemical Engineering,
Kyoto University, Kyoto 606.

J. of Fermentation Technology, **59**, 131 (Apr. 81)

**R81R021. Continuous production of
12-ketochenodeoxy cholic acid in a
column reactor containing immo-
bilized living cells of *Brevibacterium
fuscum*.**

H. Sawada, S. Kinoshita, T. Yoshida &
H. Taguchi

Department of Fermentation Technology,
Faculty of Engineering, Osaka University,
Yamada-Kami, Suita-Shi, Osaka 565.

J. of Fermentation Technology, **59**, 111
(Apr. 81)

**R81R022. Inactivation of biotin in
molasses by gamma-radiation.**

H. Watanabe & T. Sato

Takasaki Radiation Chemistry Research
Establishment, Japan Atomic Energy
Research Institute, Watanukimachi 1233,
Takasaki, Gunma 370-12.

J. of Fermentation Technology, **59**, 169 (Apr. 81)

**R81R023. Microbial transformations
of natural anti-tumour agents. Part
15. Metabolism of bruceantin by
Streptomyces griseus.**

M. M. Chien & J. P. Rosazza

Division of Medicinal Chemistry and
Natural Products, College of Pharmacy,
The University of Iowa, Iowa City, Iowa
52242, U.S.A.

J. of the Chemical Society, Perkin Transactions,
I, **5**, 1352 (1981)

R81R024. Modelling of cephalosporin C production and its application to fed-batch culture.

M. Matsymura, T. Imanaka, T. Yoshida & H. Taguchi

Department of Fermentation Technology,
Faculty of Engineering, Osaka University,
Yamada-Kami, Suita-Shi, Osaka 565.

J. of Fermentation Technology, **59**, 115
(Apr. 81)

R81R025. Neuraminidase production by bacteroidaceae.

A. G. Fraser & R. Brown

Department of Bacteriology, Medical
School, University of Edinburgh, Teviot
Place, Edinburgh EH89AG

J. of Medical Microbiology, **14**, 63
(1 Feb. 81)

R81R026. On-line optimal control of fed-batch culture of glutamic acid production.

M. Kishimoto, T. Yoshida & H. Taguchi

Department of Fermentation Technology,
Faculty of Engineering, Osaka University,
Yamada Kami, Suita-shi, Osaka 565.

J. of Fermentation Technology, **59**, 125
(Apr. 81)

R81R027. Optimal operation and replacement policies for reactor with immobilized enzymes subject to deactivation.

K. Suga, K. C. Chen & H. Taguchi

Department of Fermentation Technology,
Faculty of Engineering, Osaka University,
Yamada-Kami, Suita-shi, Osaka 565.

J. of Fermentation Technology, **59**, 1
(Apr. 81)

R81R028. Performance evaluation of mechanical foam-breakers utilizing the impact force of dispersed liquid particles.

A. Ohkawa, K. Yamagiwa, N. Sakai & Y. Takahara

Department of Chemical Engineering,
Niigata University, Ikarashi, Niigata
950-21.

J. of Fermentation Technology, **59**, 1
(Apr. 81)

R81R029. Relationship between foam-breaking performance and hydraulic behavior of liquid dispersed from mechanical foam-breakers.

A. Ohkawa, K. Yamagiwa, N. Sakai & Y. Takahara

Department of Chemical Engineering,
Faculty of Engineering, Niigata University,
Ikarashi, Niigata 950-21.

J. of Fermentation Technology, **59**, 1
(Apr. 81)

R81R030. Release of gossypol from cotton seed meal in fermentation medium.

V. G. Khandeparkar

Cotton Technological Research Laboratory,
Matunga, Bombay-400 019.

Indian J. of Experimental Biology, **19**, 57
(June 81)

81R031. **Taxonomical studies on a strain of *Streptomyces* producing glucose isomerase.**

K. Hayashi, A. Seino, T. Kasumi, N. Kubo & N. Tsumura

National Food Research Institute, Ministry of Agriculture Forestry and Fisheries, Kannondai, Yatabe-machi, Tsukubagun, Ibaraki 305, Japan.

J. of Fermentation Technology, **59**, 83 (Apr. 81)

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ENDOCRINE SYSTEM

R81A200. Adrenal responses to progesterone in newborn lambs.

D. Carson & J. R. G. Challis

Division of Obstetrics and Gynecology, University of Calgary, 2500 University Avenue, Calgary, Alberta, Canada T2N 1N4.

American J. Obstetrics and Gynecology, **139**, 59 (1 Feb. 81)

R81A201. The binding of sex steroids to human spermatozoa: an autoradiographic study.

L. Y. Cheng, B. Boettcher, R. J. Rose, D. J. Kay & H. R. Tinneberg

Department of Biological Sciences, University of Newcastle, New South Wales, 2308, Australia.

International J. of Andrology, **4**, 1 (Feb. 81)

R81A202. A comparison of acid phosphatase activity in the spermatozoa of androgenic cells of the testes of impuberal and sexually competent *Pteropus giganteus giganteus* brunnich (Magachiroptera: Mammalia).

S. K. David & S. B. Lall

Department of Zoology, University of Udaipur, Udaipur, India.

Current Science, **50**, 400 (5 May 81)

R81A203. Comparison of the content of chlorinated pesticide residues in human semen, testicles and fat tissues.

G. A. Szymczynski & S. M. Waliszewski

Department of Andrology, Medical School of Poznan, Jackowskiego 41, PL-60-513 Poznan, Poland.

Andrologia, **13**, 250 (May-June 81)

R81A204. Computer-aided counting with the coulter counter of low numbers of spermatozoa in human semen.

T. Sundqvist, B. Fjallbrant & K. E. Magnusson

Department of Medical Microbiology, University of Linköping S-58185 Linköping, Sweden.

International J. of Andrology, **4**, 18 (Feb. 81)

R81A205. Concentrations of seven elements in the intraluminal fluids of the rat seminiferous tubules, rete testis, and epididymis.

A. D. Jenkins, C. P. Lechene & S. S. Howards

Box 422, University of Virginia Medical School, Charlottesville, VA 22908.

Biology of Reproduction, **23**, 981 (Dec. 80)

R81 206. Contractions of the rabbit vas deferens following sexual activity: A mechanism for proximal transport of spermatozoa.

G. S. Prins & L. J. D. Zaneveld

Department of Urology, Northwestern University Medical School, Chicago, IL 60611, USA.

Biology of Reproduction, 23, 904 (Dec. 80)

R81A207. Correlative study of changes in the morphology of the LH gonadotroph and anterior pituitary gland LH secretion during the 4 day rat estrous cycle.

C. A. Blake

Department of Anatomy, University of Nebraska Medical Center, Omaha, Nebraska 68105.

Biology of Reproduction, 23, 1097 (Dec. 80)

R81A208. Desoxycorticosterone in normal pregnancy. III, Evidence of a fetal source of desoxycorticosterone.

W. E. Nolten, L. H. Holt* & P. A. Rueckert

Department of Obstetrics and Gynecology, University of Chicago, Chicago, Illinois, USA.

American J. of Obstetrics and Gynecology, 139, 477 (15 Feb. 81)

R81A209. Developmental changes in the ability of follicle stimulating hormones to stimulate estrogen synthesis *in vivo* by the testis of the rat.

D. K. Pomerantz

Department of Physiology, University of Western Ontario, London, Ontario, Canada N6A 5C1.

Biology of Reproduction, 23, 948 (Dec. 80)

R81A210. Dolichol concentration and biosynthesis in rat testis and epididymis.

J. C. Wenstrom & D. W. Hamilton*

Department of Anatomy, 321 Church St. S. E. 4-135 Jackson Hall, University of Minnesota, Minneapolis, MN 55455.

Biology of Reproduction, 23, 1045 (Dec. 80)

R81A211. Effects of cocaine on Ca mobility in microsomal fraction from rat vas deferens.

T. Hisayama, I. Takayanagi* & Y. Kasuya

Department of Chemical Pharmacology, Toho University School of Pharmaceutical Sciences, Miyama, Funabashi, Chiba 274, Japan.

Japanese J. of Pharmacology, 31, 1 (Feb. 81)

R81A212. Effects of low doses of alpha chlorohydrin on the dehydrogenases and oxidases of rat epididymal epithelium and sperms: a correlative histochemical and biochemical study.

S. Kaur & S. S. Guraya

Department of Zoology, Punjab Agricultural University, Ludhiana, Punjab, India.

Andrologia, 13, 225 (May-June 81)

R81A213. Effects of testosterone and estradiol on prostaglandin E synthesis by rat kidney medulla.

I. Hirafuji, S. Satoh & Y. Ogura

Department of Pharmacology, Pharmaceutical Institute, Tohoku University, Aoba-ama, Sendai 980, Japan.

Japanese J. of Pharmacology, **31**, 33 (Feb. 81)

R81A214. Elevated free cortisol index in pregnancy: possible regulatory mechanisms.

V. E. Nolten & P. A. Ruecket

University of Wisconsin, Department of Medicine 600 Highland Ave., Madison, Wisconsin 53792, USA.

American J. of Obstetrics and Gynecology, **139**, 992 (15 Feb. 81)

R81A215. Energy requirements of the developing mammalian blastocyst for active ion transport.

D. J. Benos & R. S. Balaban

HLHRRB, Harvard Medical School 45, Shattuck St., Boston, MA 02115, USA.

Biology of Reproduction, **23**, 941 (Dec. 80)

R81A216. Erythrocyte vitamin B₁₂ activity in lactovegetarian pregnant Indian women.

V. S. Jathar & A. B. Inamdar-Deshmukh

Bioran Medical Laboratory, 415 Massachusetts Avenue, Cambridge, MA 02139, USA.

Acta Haematologica, **65**, 153 (No. 3, 1981)

R81A217. Estradiol and progesterone profiles indicate a lack of endocrine recognition of pregnancy in the opossum.

J. D. Harder & M. W. Fleming*

Department of Zoology, Ohio State University, Columbus 43210, USA

Science, **212**, 1400 (19 June 81)

R81A218. Estrogen and uterine sensitization for the decidual cell reaction: Role of prostaglandins.

T. G. Kennedy

M. R. C. Group in Reproductive Biology, Department of Obstetrics and Gynecology, University of Western Ontario, 339 Windermere Road, London, Ontario, Canada N6A 5A5.

Biology of Reproduction, **2**, 955 (Dec. 80)

R81A219. First European workshop on molecular and cellular endocrinology of the testis.

H. A. Aakvaag, & K. Purvis

International J. of Andrology, Supplement No. 3, 1-143 (Feb. 81)

R81A220. The glucose tolerance test as a means of identifying intrauterine growth retardation.

V. A. Khouzami, D. S. Ginsburg, N. H. Daikoku & J. W. C. Johnson

108, Hanvey, The Johns Hopkins Hospital, Baltimore, Maryland 21205, USA.

American J. of Obstetrics and Gynecology, **139**, 423 (15 Feb. 81)

R81A221. Hormonal control of testosterone secretion by the fetal rat testis in organ culture.

G. F. Paz, J. A. Thliveris, J.S.D. Winter, F. I. Reyes & G. Faiman*

G 449, Health Sciences Centre, 700 William Ave, Winnipeg, Manitoba, Canada R3E 0Z3.

Biology of Reproduction, 23, 1087 (Dec. 80)

R81A222. Hypothalamo-hypophyseal sensitivity to hormones in the hen. 1. Plasma concentrations of LH, progesterone, and testosterone in response to central infections of progesterone and R5020.

A. L. Johnson & A. Van Tienhoven

Department of Poultry and Avian Sciences
Cornell University, Ithaca, New York, 14853, USA.

Biology of Reproduction, 23, 910 (Dec. 80)

R81A223. Hyperprolactinemia-A significant factor in female infertility.

J. V. Kredentser, C. F. Hoskins & J. Z. Scott*

Department of Obstetrics and Gynecology, 5-122 Clinical Sciences Bldg, University of Alberta, Edmonton, Alberta, Canada T6G 2G3.

American J. of Obstetrics & Gynecology, 139, 264 (1 Feb. 81)

R81A224. Immunological sterilization of male dogs by BCG.

R. K. Naz & G. P. Talwar

Department of Biochemistry, All India Institute of Medical Sciences, New Delhi.

International J. of Andrology, 4, 111 (Feb. 81)

R81A225. The importance of testicular interstitial fluid in the transport of injected hCG to the Leydig cells.

R. M. Sharpe

MRC Unit for Reproductive Biology, Centre for Reproductive Biology, 3 Chalmers Street, Edinburgh, EH 39EV Scotland.

International J. of Andrology, 4, 64 (Feb. 81)

R81A226. An increase in catecholamines and metabolites in the amniotic fluid compartment from middle to late gestation.

W. A. Divers, Jr., M. M. Wilkes

A. Babaknia & S. S. C. Yen*

Department of Reproductive Medicine, School of Medicine (T-002), University of California, San Diego, La Jolla, California 92093, USA.

American J. of Obstetrics & Gynecology, 139, 483 (15 Feb. 81)

R81A227. Induced protein and deciduoma formation in rat uterus.

S. C. Bell, J. Hamer & P. J. Heald*

Faculty of Science, Memorial University of Newfoundland, St. John's Newfoundland, Canada.

Biology of Reproduction, 23, 935 (Dec. 80)

R81A228. Influence of LRH on gonadotrophin and testosterone levels in the foetal male rat.

V. Krause & H. M. Hubner

Department of Andrology, Center of Dermatology, Justus Liebig Universität, Baffkystr 14, D-6300 Giessen.

International J. of Andrology, **4**, 86 (Feb. 81)

R81A229. Inhibitors of acrosomal proteinase as antifertility agents, a problem of acrosomal membrane permeability.

W. B. Schill, M. Feifel, H. Fritz & J. Hammerstein

Andrology Unit of the Department of Dermatology, Frauenlobstrasse 9/11, D-8000 Munich 2, F.R.G.

International J. of Andrology, **4**, 25 (Feb. 81)

R81A230. In vitro binding to and in vivo effect on the cytosol and nuclear progesterone receptors of various progestins and their relationship to synthesis of uteroglobin in rabbits uterus.

Veli Isomaa

The Population Council, The Rockefeller University, York Avenue and 66th Street, New York, NY 10021, USA.

Biochemica et Biophysica Acta, **675**, 9 (11 June 81)

R81A231. Lack of relationship between prolactin and adrenal steroidogenesis in the ovine fetus.

K. Takahashi, F. Auletta, H. Tseng, A. Scommegna & L. I. Burd*

Division of Fetal and Maternal Medicine, Department of Obstetrics and Gynaecology, Michael Reese Hospital and Medical Center, 2929 South Ellis Ave., Chicago, Illinois 60616, USA.

American J. of Obstetrics and Gynaecology, **139**, 427 (15 Feb. 81)

R81A232. A modern approach to the gonadotropin treatment in oligozoospermia.

A. Isidori

V. Clinica Medica, Policlinico Umberto I, I-106100 Roma/Italy.

Andrologia, **13**, 187 (May-June 81)

R81A233. Motile components in early rat spermatids.

H. Walt

Institute of Pathology, University of Zurich, University Hospital, CH-8091 Zurich, Switzerland.

Cell Differentiation, **10**, 157 (May 81)

R81A234. Motility assay of human sperm by photon correlation spectroscopy.

J. Frost & H. Z. Cummins

Department of Physics City College, City University of New York, N. Y. 10031, USA.

Science, **212**, 1520 (26 June 81)

R81A235. Occurrence of bio-immuno active inhibin in rat spermatids.

A. R. Sheth, S. P. Dandekar & N. Seethalakshmi

Institute for Research in Reproduction (ICMR), J. Merwanji Street, rarel, Bombay-400 012.

Andrologia, 13, 232 (May-June 81)

R81236. Prolactin-stimulated ovarian androgen metabolism.

M. L. Polan & H. R. Behrman

Department of Obstetrics and Gynecology, Yale University School of Medicine, 333 Cedar St. New Haven, Connecticut 06510, USA.

American J. of Obstetrics and Gynecology, 139 487 (15 Feb. 81)

R81A237. Prostaglandins do not affect steroidogenesis and are not being produced in response to OLH in chicken granulosa cells.

F. Hertelendy & R. W. Hammond

Department of Obstetrics and Gynecology, St. Louis University Medical Centre, 1325 S Grand Boulevard, St. Louis MO 63104, USA.

Biology of Reproduction, 23, 918 (Dec. 80)

R81A238. A protein-binding radioassay for 6 β -hydroxycortisol: detection in pregnancy urine and amniotic fluid.

S. J. Bowler-wong, D. M. Hay & F. L. Lorscheider*

Medical Physiology, Faculty of Medicine University of Calgary, Calgary, Alberta Canada T2N 1N4.

American J. of Obstetrics & Gynecology, 139 243 (1 Feb. 81)

R81A239. Recent advances in the total synthesis of steroid via intramolecular cycloaddition reactions.

T. Kametani & H. Nemoto

Pharmaceutical Institute, Tohoku University, Aobayama Sendai 980, Japan

Tetrahedron, 37, 3 (No. 1, 1981)

R81A240. Seminal plasma fructose, zinc, magnesium and acid phosphatase in cases of male infertility.

T. Abyholm, J. Kofstad, K. Molne & S. S. Pederson

Department of Obstetrics and Gynecology, Rikshospitalet University of Oslo, Oslo, Norway.

International J. of Andrology, 4, 75 (Feb. 81)

R81A241. Sequential inhibitory effects of progesterone on lordotic responsiveness in rats: Time course of estrogenic nullification, and actinomycin-D insensitivity.

B. D. Shivers, R. E. Harlan, C.R. Parke Jr. & R. L. Moss

The Rockefeller University, New York N. Y. 10021, USA.

Biology of Reproduction, 23, 963 (Dec. 80)

R81A242. Short-term increase of term output under metoclopramide administration.

Jecht, H. P. Kleissl & U. Pache

Marktstrabe 14, D 8520 Erlangen,
Federal Republic of Germany.

International J. of Andrology, **4**, 49 (Feb. 81)

R81A243. Stimulatory effect of proteinizing hormones and human chorionic gonadotropin on testicular prolactin receptor levels.

P. A. Kelly, C. Seguin, L. Cusan & F. Labrie

Department of Molecular Endocrinology,
Le Centre Hospitalier de l'Universite
Laval Quebec, G1V 4G2, Canada.

Biology of Reproduction, **23**, 924 (Dec. 80)

R81A244. Studies on the male anti-fertility agent-gossypol acetic acid. III. Effect of gossypol acetic acid on rat testis.

N. R. Kalla, M. Vasudev & G. Arora

Department of Biophysics, Panjab University,
Chandigarh-160 014.

Andrologia, **13**, 242 (May-June 81)

R81A245. Studies on the mechanism of the GAB Aergic inhibition of TSH secretion in male rats.

J. Mattila

Department of Pharmacology, University
of Helsinki, Siltavuorenpenger 10A, SF-
00170 Helsinki 17, Finland.

Acta Pharmacologica et Toxicologica, **48**, 320
(Apr. 81)

R81A246. Studies on β -phenylethylamine deamination by human placental monoamine oxidase.

K. Oguchi, S. Kobayashi, T. Uesato &
K. Kamijo

Department of Pharmacology, School of
Medicine, Showa University, Hatanodal,
Shinagawa-ku, Tokyo 142, Japan.

Japanese J. of Pharmacology, **31**, 7 (Feb.
81)

R81A247. A study of the effects of hypothyroidism induced by propylthiouracil on adrenoceptors and noradrenaline levels in the vas deferens of the rat.

J. A. Leedham, G. M. Handberg, E. J.
Ishac & J. N. Pennefather*

Department of Pharmacology, Monash
University, Clayton, Victoria 3168,
Australia.

*Clinical and Experimental Pharmacology, &
Physiology*, **8**, 159 (Mar.-Apr. 81)

R81A248. Synthesis of ring modified prostaglandins.

J. P. Depres, A. E. Greene* & P. Crabbe

Laboratoire de Chemie Organique
CERMO, Universite Scientifique Medi-
cale, 38041 Grenoble, France.

Tetrahedron, **37**, 621 (No. 3, 1981)

R81A249. Thrombin inhibitors in women on oral contraceptives

E. Guagnellini, G. Bertolini, M. Cappelletti & G. Colombo

Laboratory of Clinical Chemistry, Bassini Hospital, via M. Gorki, I-20092 Cinisello Balsamo, Italy.

Acta Haematologica, **65**, 205 (No. 3, 1981)

R81A250. Uterine prostaglandin levels in pregnant ovariectomized rats.

S. K. Garg & P. Pandhi

Department of Pharmacology, Postgraduate Institute of Medical Education & Research, Chandigarh-160 012.

Indian J. of Medical Research, **73**, 782 (May 1981)

B NERVOUS SYSTEM**R81B212. Adverse effects of antipsychotic agents.**

G. M. Simpson, E. H. Pi & J. J. Sramek, Jr.

Department of Psychiatry, USC School of Medicine, 1934 Hospital place, Los Angeles California 90033 (USA).

Drugs, **21**, 138 (Feb. 81)

R81B213. Alterations in human memory following acute maprotiline, diazepam and codeine administration.

R. Liljequist, M. J. Mattila & M. Linnoila

University of Helsinki, Department of Pharmacology, Siltavuorenpenger 10 A, SF-00170 Helsinki, Finland.

Acta Pharmacologica et Toxicologica, **48**, 190 (Feb. 81)

R81B214. Analgesia: the theory and the practice.

Pharmaceutical J. **226**, 624 (13 June 81)

R81B215. Anti-inflammatory agents. Part III. Synthesis of 3-aryl-2H-1, benzoxazin-2-one-6-alkanoic acid esters as potential anti-inflammatory agents.

D. R. Shridhar, C. V. Reddy Sastry, Lal. P. P. Singh, C. Seshagiri Rao & A. Y. Junnarkar

Chemistry Division, IDPL-Research Centre, Indian Drugs & Pharmaceutical Limited, Hyderabad-500 037.

Indian J. of Chemistry, **20B**, 311 (April 81)

R81B216. An autoradiographic study on the terminal distribution of cerebellothalamic fibers in the cat.

T. Sugimoto, N. Mizuno & K. Itoh

Department of Anatomy (1st Division) Faculty of Medicine, Kyoto University, Kyoto 606, Japan.

Brain Research, **215**, 29 (29 June 81)

1B217. Backward walking induced L-5-hydroxytryptophan in mice.

Shimomura, J. Mori & F. Honda

Research Laboratories, Fujisawa Pharmaceutical Co. Ltd., Kashima, Yodogawa-Osaka-532 Japan.

Japanese J. of Pharmacology, **31**, 39 (Feb. 81)**1B218. Baroreceptor reflex in the rat after converting enzyme inhibition or angiotensin receptor blockade.**

G. Coleman, M. C. O. Salgado, R. G. Engis, M. H. Davis, Jr & A. C. Dent

Department of Physiology & Biophysics, University Mississippi Medical Center, 200 North State Street Jackson M. S. 39216 U.S.A.

Clinical Experimental Pharmacology & Physiology, **8**, 79 (Jan/Feb. 81)**1B219. Benzodiazepine binding and interactions with the gaba receptor complex in living cultures of rat cerebral cortex.**

V. F. White, M. A. Dichter & S. R. Modgrass

Department of Neuro-science, Children's Hospital Medical Center & Department of Neuropathology, Harvard Medical School Boston, Mass 02115 USA.

Brain Research, **215**, 162 (29 June 81)**R81B220. Benzothiazole derivatives: Part XI-Synthesis & anti-inflammatory activity of some 2-(3, '5', Dime-thyl-4'-substituted-pyrazazol-1'-yl) benzothiazoles.**

S. N. Sawhney, R. K. Tomer, Om Prakash, Indra Prakash & S. P. Singh

Department of Chemistry, Kurukshetra University, Kurukshetra-132 119.

Indian J. of Chemistry, **20B**, 314 (April 81)**R81B221. Catecholamine synthesis regulation in hypothalamic synaptosomes.**

D. A. Haycock & R. L. Patrick

Box G, Brown University, Providence Rhode Island-02912, U.S.A.

Brain Research, **214**, 371 (15 June 81)**R81B222 Central nervous system active compounds. VI. Reissert compounds as precursors of 1-(3-phthalidyl) isoquinolines.**

T. V. Hung, B. A. Monney, R. H. Prager & A. D. Ward

Organic Chemistry Department, University of Adelaide, P. O. Box 498, Adelaide, S. A. 5001.

Australian J. of Chemistry, **34**, 151 (No. 1, 1981)**R81B223. Central nervous system active compounds. VII phthalide synthesis by lithiation of alkoxyaromatics.**

T. V. Hung, B. A. Mooney, R. H. Prager & J. M. Tippet

Organic Chemistry Department, University of Adelaide P. O. Box 498 Adelaide, S. A. 5001.

Australian J. of Chemistry, **34**, 383 (No. 2, 1981)

R81B224. Cholinergic receptor interactions and their effects on long-term memory processing.

J. F. Flood, D. W. Landry & M. E. Jarvik

Department of Psychology & Department of Psychiatry School of Medicine, The Neuropsychiatric Institute, University of California, Los Angeles, California-90024 U.S.A.

Brain Research, **215**, 177 (29 June 81)

R81B225. Chronic morphine administration increases the apparent number of α -2-adrenergic receptors in rat brain.

M. Hamburg & J. F. Tallman

Section on Biochemistry and Pharmacology, Biological Psychiatry Branch, National Institute of Mental Health, 9000 Rockville, Pike, Bethesda, Maryland 20205, U.S.A.

Nature, **291**, 493 (11 June 81)

R81B226. Contralateral denervation causes enhanced transmitter release from frog motor nerve terminals.

A. A. Herrera & A. D. Grinnell

Department of Physiology, Jerry Lewis Neuromuscular Research Center, Ahmanson Laboratory of Neurobiology, School of Medicine, University of California, Los Angeles, California-90024, USA.

Nature, **291**, 495 (11 June 1981)

R81B227. Convulsive effect of theophylline in conscious and anaesthetized guinea pigs.

C. G. A. Persson & I. Eryefalt

Research & Development Laboratory A.B. Draco, Box 1707, S-22101 Lund Sweden

Acta Pharmacologica et Toxicologica, **48**, 1 (Jan. 81)

R81B228. (D-ALA², N-VAL⁵), (D-AL² MET⁵ Enkephalins and enkephalinamides: correlation between biological activity and NMR features.

J. E. Gairin, R. Haran, H. Mazarguil, Audigier & J. Cros

Laboratoire de Chimie de Narbonne 31078 Toulouse, Cedex, France.

FEBS Letters, **128**, 51 (1 June 81)

R81B229. The effect of chronic lithium treatment on the sialic acid content in rat brain synaptosomes.

S. Edelfors

Department of Pharmacology, University of Copenhagen, 20, Juliane Maries Vej, DK-2100 Copenhagen.

Acta Pharmacologica et Toxicologica, **48**, 6 (Jan 81)

R81B230. Effect of copper on the uptake and release of monoamines in rat brain synaptosomes.

H. Komulainen & J. Tuomisto

Department of Pharmacology & Toxicology, University of Kuopio P. O. Box 138 SF-70101 Kuopio 10 Finland.

Acta Pharmacologica et Toxicologica, **48**, 20 (March 81)

R81B231. Effect of depletion of spinal noradrenaline by 6-hydroxydopamine on the development of renal hypertension in rats.

M. C. Bosland, D. H. G. Versteeg, J. Van Put & W. de Jong*

Rudolf Magnus Institute for Pharmacology, Vondellaan 6, 3521 GD. Utrecht, The Netherlands.

Clinical & Experimental Pharmacology & Physiology, **8**, 67 (Jan. Feb. 81)

R81B232. Effect of heavy metals on dopamine noradrenaline and serotonin uptake and release in rat brain synaptosomes.

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Acta Pharmacologica et Toxicologica, **48**, 199 (March 81)

R81B233. Effect of manganese on synthesis of brain catecholamines in growing rats.

S. V. Chandra & G. S. Shukla

Industrial Toxicology Research Centre, Post-Box No. 80 Lucknow-226001.

Acta Pharmacologica et Toxicologica, **48**, 349 (April 81)

R81B234. The effect of melanotrophin release inhibiting factor (MIF) and Cyclo (LEU-GLY) on the tolerance to morphine induced antinociception in the rat: A dose-response study.

H. N. Bhargava

Department of Pharmacognosy & Pharmacology, College of Pharmacy, University of Illinois at the Medical Centre, Chicago, Illinois 60612, U.S.A.

British J. of Pharmacology, **72**, 707 (April 81)

R81B235. Effect of nicotinic and muscarinic drugs on amphetamine- and apomorphine-induced circling behaviour in rats.

S. Kaakkola

Department of Pharmacology, University of Helsinki, Siltavuorenpenger 10, SF-00170 Helsinki 17, Finland.

Acta Pharmacologica et Toxicologica, **48**, 162 (Feb. 81)

R81B236. Effect of serotonin antagonists on the dextran-induced anaphylactoid reaction in rat.

J. Berstad

Department of Pharmacology, Institute of Pharmacy, University of Oslo, Blindern Oslo 3, Norway.

Acta Pharmacologica et Toxicologica, **48**, 438 (May 81)

R81B237. Effect of some beta blocking agents on anti-inflammatory action of oxyphenbutazone and dexamethasone on carrageenin induced paw edema in rats.

M. T. Brahmapurikar, P. J. Moghe, M. Mateenuddin & N. L. Sadre

Department of Pharmacology, Medical College, Aurangabad.

Indian J. of Pharmacology, **12**, 243 (Oct-Dec. 80)

R81B238. The effect of systemic morphine upon diffuse noxious inhibitory controls (DNIC) in the rat: Evidence for a lifting of certain descending inhibitory controls of dorsal horn convergent neurones.

O. Le Bars, D. Chitour, E. Kraus, A. M. Clot, A. H. Dickenson & J. M. Besson

Unite de Recherches de Neurophysiologie Pharmacologique, de l' I.N.S.E.R.M. (U. 161), 2, rued, Alesia, 75014 Paris (France).

Brain Research, **215**, 257 (29 June 81)

R81B239. Effects of CDP-Choline on striatal dopamine level and behaviour in rats.

M. Shibuya, N. Kageyama, T. Taniguchi, H. Hidaka & M. Fujiwara

Department of Neurosurgery, Nagoya University School of Medicine, Nagoya-466 Japan.

Japanese J. of Pharmacology, **31**, 47 (Feb. 81)

R81B240. Effects of exogenous stimulate and centrally acting drugs on galvanic skin responses in rats.

T. Hata, T. Kita, R. Yoneda & S. Tanada

Department of Pharmacology, Faculty of Pharmacy, Kinki University, Higashi-Osaka 577 Japan.

Japanese J. of Pharmacology, **31**, 23 (Feb.81)

R81B241. Effects of Gaba-ergic drugs on brain stimulation reward as assessed by a threshold method.

P. Zarevics & P. E. Setler

Department of Pharmacology, Searle Kline & French Laboratories, Philadelphia, Pa, 19101 USA.

Brain Research, **215**, 201 (29 June 81)

R81B242. The effects of Gaba-ergic drugs on enkephalin-induced motor seizure phenomena in the rat.

M. R. Dzojijic & A. L. V. D. Poel-Houterkamp

Department of Pharmacology, Faculty of Medicine, Erasmus University, Rotterdam, The Netherlands.

Clinical & Experimental Pharmacology Physiology, **8**, 141 (March/April 81)

R81B243. Effects of inflammatory agents on endothelial lysosomal fragility & their inhibition by anti-inflammatory drugs.

J. R. Yoffe

Department of Biochemistry, University of Kansas, Lawrence, Kansas-660 U.S.A.

British J. of Pharmacology, **72**, 603 (April 81)

R81B244. Effects of isoprenaline, levodopa and a phosphodiesterase inhibitor (IC 163, 197) on cyclic AMP levels and contractions of soleus muscles in anaesthetized cats.

Z. Merican & M. W. Nott*

Department of Pharmacology, University of Melbourne, Parkville, Victoria-30 Australia.

Clinical and Experimental Pharmacology Physiology, **8**, 57 (Jan./Feb. 81)

R81B245. The effects of levamisole and D-penicillamine on some inflammatory models *in vivo* & on PG production *in vitro*.

Capasso, N. Mascolo, G. Autore

Institute of experimental Pharmacology, Faculty of Pharmacy, University of Naples via L. Rodino 22, 80138 Naples, Italy.

Pharmacological Research Communications, **13**, 85 (April 81)

R81B246. Electrical activity of brain in endosulfan toxicity.

M. Anand, R. N. Khanna & D. Misra

Industrial Toxicology Research Centre Post-Box No. 80, Mahatma Gandhi Marg, Lucknow-226 001.

Indian J. of Pharmacology, **12**, 229 (Oct.-Dec. 80)

R81B247. Enhancement of etorphine brain concentrations and changes in etorphine-naloxone PA_2 values in morphine-pretreated mice.

D. G. Lange, S. C. Roerig, J. M. Fujimoto* & R. I. H. Wang

Department of Pharmacology & Toxicology, The Medical College of Wisconsin P. O. Box 26509, Milwaukee, W53226, USA.

Biochemical Pharmacology, **30**, 147 (15 Jan. 81)

R81B248. Extrahypothalamic vasopressin in human brain.

M. N. Rossor, L. L. Iversen, J. Hawthorn, V. T. Y. Ang & J. S. Jenkins

M. R. C. Neurochemical Pharmacology Unit, Department of Neurological Surgery & Neurology, Addenbrooke's Hospital, Cambridge CB22QQ.

Brain Research, **214**, 349 (15 June 81)

R81B249. Influence of sino-aortic baroreceptor denervation on catecholamines, catecholamine-synthesizing enzymes and choline acetyltransferase activity in the brainstem nuclei of the rat.

K. Nakamura & K. Nakamura

Department of Pharmacology, Nippon Roche Research Center, Kamakura-247 Japan.

Japanese J. of Pharmacology, **31**, 95 (Feb. 81)

R81B250. Interaction of putative opioid peptides with opiate receptors.

K. Stengaard-Pedersen & L. I. Larsson

Institute of Medical Biochemistry, University of Aarhus, DK-8000 Aarhus, Denmark.

Acta Pharmacologica et Toxicologica, **48**, 39 (Jan. 81)

R81B251. Interference of methyl mercury with monoamine uptake and release in rat brain synaptosomes.

H. Komulainen & J. Taomisto

Department of Pharmacology & Toxicology, University of Kuopio, P. O. Box 138 SF-70101 Kuopio 10, Finland.

Acta Pharmacologica et Toxicologica, **48**, 214 (March 81)

R81B252. Interregional differences in brain intracellular pH and water compartmentation during acute normoxic and hypoxic hypocapnia in the anesthetized dog.

D. A. Relligrino, T. I. Musch & J. A. Dempsey

Lund Universitet, Forskn, Avd 4, E-Blocket Lasarettet, S-22185, Lund, Sweden.

Brain Research, **214**, 387 (15 June 81)

R81B253. A keyboard data collecting device for behavioural recordings.

A. U. Hoglund, J. E. Hagglund & B. J. Meyerson

Department of Medical Pharmacology, University of Uppsala, Box 573 S-75123 Uppsala, Sweden.

Acta Pharmacologica et Toxicologica, **48**, 181 (Feb. 81)

R81B254. Lorazepam; a review of its clinical pharmacological properties and therapeutic uses.

B. Ameer & D. J. Greenblatt*

Division of Clinical Pharmacology, Box 1007, New England Medical Center Hospital 171 Harrison Avenue Boston M. A. 02111 (USA).

Drugs, **21**, 161 (March 81)

R81B255. Manganese toxicity: lipid peroxidation in rat brain.

G. S. Shukla & S. V. Chandra

Industrial Toxicology Research Centre, Lucknow-226 001.

Acta Pharmacologica et Toxicologica, **48**, 95 (Feb. 81)

R81B256. Mechanisms of slow post-synaptic potentials.

H. C. Hartzell

Department of Anatomy, Emory University School of Medicine Atlanta, Georgia 30322 USA.

Nature, **291**, 539 (18 June 81)

R81B257. Memory performance of chemical workers exposed to polybrominated biphenyls.

G. G. Brown, R. C. Preisman, M. D. Anderson, R. K. Nixon, J. L. Isbister & H. A. Price

Psychiatry Department, Henry Ford Hospital, Detroit Michigan-48202.

Science, **212**, 1413 (19 June 81)

R81B258. Monoaminergic mechanism of electroacupuncture analgesia.

R. S. S. Cheng & B. Pomeranz

Zoology Departments, University of Toronto, Ontario M5S 1A1, Canada.

Brain Research, **215**, 77 (29 June 81)

R81B259. Morphine and α -opiate agonists locally stimulate *in vivo* dopamine release in cat caudate nucleus.

M. F. Chesselet, A. Cheramy, T. D. Reisine & J. Glowinski

Groupe N. B Inserm U. 114, College de France, 11, Place Marcelin Berthelot, 75231 Paris Cedex 5, France.

Nature, **201**, 320 (28 May 81)

R81B260. Morphine-induced attenuation of morphine tolerance.

. Siegel, R. E. Hinson & M. D. Krank

Department of Psychology, McMaster University, Hamilton, Ontario L854KI, Canada.

Science, **212**, 1533 (26 June 81)

R81B261. Myelination of central nervous system axons in tissue culture by transplanted oligodendrocytes.

F. J. Seil & N. K. Blank

Neurology & Research Services, Veterans Administration Medical Center, Portland, Oregon-97201.

Science, **212**, 1407 (19 June 81)

R81B262. The passage of flunitrazepam into cerebrospinal fluid in man.

L. Aaltonen, J. Kanto, E. Iesalo, K. Koski, M. Salo & T. Surtola

Department of Pharmacology, Turku University, Central Hospital, Turku, Finland.

Acta Pharmacologica et Toxicologica, **48**, 364 (April 81)

R81B263. Permeability alteration of blood brain barrier by alcohols.

A. Gulati, C. Nath, K. N. Dhawan*, K. Shanker & K. P. Bhargava

Department of Pharmacology & Therapeutics, K. G. Medical College, Lucknow-226 003.

Indian J. of Medical Research, **73**, 793 (May 81)

R81B264. Pharmacokinetics of terbutaline and theophylline in guinea pigs when administered simultaneously.

S. M. Madsen & U. Ribel

Department of Pharmacology, Royal Danish School of Pharmacy, 2 Universitetsparken DK-2100 Copenhagen, Denmark.

Acta Pharmacologica et Toxicologica, **48**, 13 (Jan 81)

R81B265. Pharmacokinetics of theophylline and 3-methylxanthine in guinea pigs. I. Single dose administration.

S. M. Madsen & Ulla Ribel

Department of Pharmacology, Royal Danish School of Pharmacy, 2 Universitetsparken, DK-2100 Copenhagen, Denmark.

Acta Pharmacologica et Toxicologica, **48**, 1 (Jan. 81)

R81B266. Pharmacokinetics of theophylline and 3-methylxanthine in guinea pigs. II. Multiple dose administration.

S. M. Madsen & U. Ribel

Department of Pharmacology, Royal Danish School of Pharmacy, 2 Universitetsparken, DK-2100 Copenhagen, Denmark.

Acta Pharmacologica et Toxicologica, **48**, 8 (Jan. 81)

R81B267. Pharmacological modification of hypertensive blood-brain barrier opening.

B. B. Johansson

Department of Neurology, University of Goteborg, Sahlgrenska Sjukhuset, S-41345 Goteborg Sweden.

Acta Pharmacologica et Toxicologica, **48**, 242 (March 81)

R81B268. Phenylethylamine effects on dopamine synthesis. Structure-activity relationships.

R. L. Patrick

Neuroscience Section, Division of Biology & Medicine, Brown University, Providence, RI 02912, USA.

Biochemical Pharmacology, **30**, 141 (15 Jan. 81)

R81B269. Possible interrelationship between the antinociceptive effect of morphine and brain 5-hydroxytryptamine in albino rats.

A. K. Sanyal, D. N. Srivastava & S. K. Bhattacharya

Department of Pharmacology, Institute of Medical Sciences, Banaras Hindu University Varanasi-221 005.

Indian J. of Medical Research, **73**, 787 (May 81)

R81B270. Recent advances in anti-glaucoma drugs.

George C. Y. Chiou

Department of Medical Pharmacology Toxicology, Texas A & M University College of Medicine, College Station, TX 77843 (USA)

Biochemical Pharmacology, **30**, 103 (15 Jan. 81)

R81B271. Response dynamics of horizontal canal afferents in barbiturate-anesthetized cats.

D. L. Tomko, R. J. Peterka, R. H. Schick & D. P. O'Leary

Department of Pharmacology, Physiology & Otolaryngology University of Pittsburgh School of Medicine, Pittsburgh, PA 15261.

J. Neurophysiology, **45**, 376 (March 81)

R81B272. The response of individual sympathetic preganglionic neurons to microelectrophoretically applied endogenous monoamines.

J. H. Coote, V. H. Macleod, S. Fleetwood-Walker & M. P. Gilbey

Department of Physiology, Medical School University of Birmingham, Birmingham B152TJ (UK)

Brain Research, **215**, 135 (29 June 81)

R81B273. The role of GABAergic inhibition in the cortical effects of monocular deprivation.

A. M. Sillito, J. A. Kemp & C. Blakemore

Department of Physiology, Medical School Birmingham-B 15 2TJ (UK)

Nature, **291**, 318 (28 May 81)

R1B274. Selective depression of naptic excitation in cat spinal neurones by baclofen: on iontophoretic study.

Davies

Department of Pharmacology, The School of Pharmacy, University of London; 29/39 Brunswick Square, London WC1N 1AX.

British J. Pharmacology, **72**, 373 (Feb. 81)

R1B275. Substance P decreases a potassium conductance of spinal cord neurons in cell culture.

M. Nowak & R. L. Macdonald*

Neuroscience Program, University of Michigan & (RLM) Department of Neurology University of Michigan Medical Center, 1103 Eastt Haron, Mich. Ann Arbor Mich 48109 (USA).

Brain Research, **214**, 416 (15 June 81)

R1B276. Tolerance to the effects of Δ^1 -tetrahydrocannabinol on the pressor responses to noradrenaline in rats.

D. M. F. Li

Department of Pharmacology, Faculty of Medicine, University of Hong Kong, Lishu Fan Building 5, Sassoon Road Hong-Kong.

Clinical & Experimental Pharmacology & Physiology, **8**, 101 (March/April 81)

R81B277. To the problem of biologically active conformation of enkephalin.

I. Z. Siemion, Z. Szewczuk,
Z. S. Herman & Z. Stachura

Institute of Chemistry, Wroctaw University 50-383 Wroctaw, Poland.

Molecular & Cellular Biochemistry, **34**, 23 (20 Jan. 81)

R81B278. A transient increase in junctional acetylcholine receptors after denervation.

A. Olek, S. Younkin, R. M. Slugg, M. Konieczkowski & N. Robbins

Anatomy & Pharmacology Departments, Case Western Reserve School of Medicine, Cleveland, Ohio 44106 (USA).

Brain Research, **214**, 429 (15 June 81)

CARDIOVASCULAR SYSTEM

R81C138. Adverse effects of anti-depressant drugs, I. Monoamine oxidase inhibitors & tricyclics.

B. Blackwell

Department of Medicine, Mount Sinai Medical Center, PO Box 342, Milwaukee, Wisconsin-53201 (USA).

Drugs, **21**, 201 (Mar. 81)

R81C139. Altered cardiac noradrenaline stores in DOCA-salt hypertensive rats.

P.R.C. Howe, M.J. West & J. P. Chalmers*

Department of Medicine, Flinders Medical Centre Bedford Park, South Australia 5042, Australia.

Clinical Experimental Pharmacology & Physiology, **8**, 83 (Jan./Feb. 81)

R81C140. Angiotensin and the cardiac baroreflex response to phenylephrine.

W. B. Lee & E. R. Lumbers*

School of Physiology and Pharmacology,
University of New South Wales, PO Box 1,
Kensington, NSW, 2033, Australia.

Clinical & Experimental Pharmacology & Physiology, **8**, 109 (Mar./Apr. 81)

R81C141. Atrion antagonism—A fifth class of antiarrhythmic action?

J. S. Millar, E. M. Vaughan Williams*

University Department of Clinical Pharmacology, South Parks Road, Oxford OX13QT.

Lancet, **I**, 1291 (13 June 81)

R81C142. The antihypertensive effects of a pure and selective serotonin-receptor blocking agent (R41468) in elderly patients.

J. DeCree, J. Leempoels, W. De. Cook, H. Geukens, & H. Verhaegen

Clinical Research Unite, St. Bartholmeus Jan Palfijn Ziekenhuis, B-2060 Merksem, Belgium.

Angiology, **32**, 137 (Feb. 81)

R81C143. Captopril and the maintenance of blood pressure after sinoaortic denervation in the rabbit.

M. A. Petty & J. L. Reid

University of Glasgow Department of Materia Medica, Stobhill General Hospital, Glasgow, G213UW.

British J. of Pharmacology, **72**, 645 (April 81)

R81C144. Cardiac B-adrenoreceptors in the thyroxine treated dog.

K. Ho, B. L. Lloyd & R. R. Taylor*

Department of Cardiology, Rayal Perth Hospital, Box X2213 GPO, Perth Western Australia.

Clinical & Experimental Pharmacology & Physiology, **8**, 183 (Mar./April 81)

R81C145. Catecholamine-induced phosphorylation of cardiac muscle proteins.

J. G. Dobson, Jr.

Department of Physiology, University of Massachusetts Medical School, 55 Lake Avenue North, Worcester M.A. 01605(U.S.A.)

Biochemica et Biophysica Acta, **675**, 12 (11 June 81)

R81C146. Comparison of antihypertensive effects of captopril and propranolol in essential hypertension.

C. M. Huang, F. DelGreco, A. Quintanilla & A. Molteni

Veterans Administration Lakeside Medical Center, 333 E Huron St. Chicago IL 60611.

J. American Medical Association, **245**, 4 (6 Feb. 81)

R81C147. Digital arterial tone in hypertensive subjects treated with cardioselective and non selective beta-adrenoreceptor blocking agents.

P. E. Nielsen & S. L. Nielsen*

Department of Clinical Physiology Herlev Hospital, D. K.-2730 Herlev Denmark.

Danish Medical Bulletin, **28**, 76 (April 81)

R81C148. Effect of adrenochrome on calcium accumulation by heart mitochondria.

S. Tokeo, G. M. L. Taam, R. E. Beamish & N. S. Dhalla*

Division of Experimental Cardiology,
Department of Physiology and Medicine,
Faculty of Medicine, University of
Manitoba, Winnipeg, Canada R-3E 0W3.

Biochemical Pharmacology, **30**, 157
(15 Jan. 81)

R81C149. Effects of histamine H₁- and H₂ receptor antagonists in the cranial circulation of the monkey.

G. D. A. Lord, E. J. Mylecharan* J. W. Duck Worth & J. W. Lance

Department of Pharmacology, University
of Sydney, Sydney, N. S. W. 2006,
Australia.

Clinical & Experimental Pharmacology & Physiology, **8**, 89 (Mar./April 81)

R81C150. Hypothesis: Iron and the sex difference in heart disease risk.

J. L. Sullivan

Department of Pathology, University of
South Florida College of Medicine,
12901 North 30th Street, Tampa, Florida-
33612, U.S.A.

Lancet, **I**, 1293 (13 June 81)

R81C151. Inotropic responses of isolated atrial and ventricular muscle from the dog heart to inosine, guanosine and adenosine.

S. Chiba, H. Watanabe & Y. Furukawa

Department of Pharmacology, Shinshu
University, School of Medicine, Matsu-
moto 390, Japan.

Clinical & Experimental Pharmacology & Physiology, **8**, 171 (Mar./April 81)

R81C152. Is vitamin B₆ an antithrombotic agent?

Editorial

Lancet, **I**, 1299 (13 June 81)

R81C153. α -Methyl-*p*-Tyrosine : A review of its pharmacology and clinical use.

R. N. Brogden, R. C. Heel, T. M. Speight
& G. S. Avery

Australasian Drug Information Services,
P. O. Box 34030, Birkenhead, Auckland
10 (New Zealand)

Drugs, **21**, 81 (Feb. 81)

R81C154. On cardioactive steroids. IV. A new synthesis of cardenolides.

R. M. Bettolo, P. Flecker, T. Y. R. Tsai,
& K. Wiesner

Natural Products Research Centre,
University of New Brunswick, Bag Service
45222, Fredericton, New Brunswick,
Canada E3B6E2.

Canadian J. of Chemistry, **59**, 1403
(1 May 81)

R81C155. Orthostatic hypotension after the first administration of prozosin in hypertensive patients: Role of the plasma volume.

A. Semplicini, A. C. Pessina, P. Palatini, M. Hlede & C. Dal Palu

Clinical Medica. 11, Policlinico Universitario, Via Giustiniani 2, 35100, Padova, Italy.

Clinical & Experimental Pharmacology & Physiology, 8, 1 (Jan./Feb. 81)

R81C156. Sodium current depression by lidocaine and quinidine in isolated ventricular cells.

K. S. Lee, J. R. Hume, W. Giles* & A. M. Brown

Department of Physiology & Biophysics, University of Texas, Medical Branch, Galveston, Texas 77550, USA.

Nature, 291, 325 (28 May 81)

R81C157. Studies in rat on endralazine, a new antihypertensive drug structurally related to hydroalazine.

H. F. Oates & L. M. Stoker

Medical Research Department, Sydney Hospital, Sydney, N. S. W. 2000 Australia.

Clinical & Experimental Pharmacology & Physiology, 8, 133 (Mar./April 81)

R81C158. Thromboxane and prostacyclin release from ischaemic myocardium in relation to arrhythmias.

S. J. Coker, J. R. Parratt, I. McA Ledingham & I. J. Zeitlin

Department of Physiology & Pharmacology, University of Strathclyde, Glasgow G11XW, UK.

Nature, 291, 323 (28 May 81)

R81C159. Vasopressor receptor antagonist prevents behavioural effects of vasopressin.

M. LeMoal, G. F. Koob, L. Y. Kodak, F. E. Bloom, M. Manning, W. H. Sawyer & J. Rivier

Davis Center for Behavioral Neurobiology and the Peptide Biology Laboratory, The Salk Institute, P. O. Box 85800, San Diego, California 92138, USA.

Nature, 291, 491 (11 June 81)

D RESPIRATORY SYSTEM

R81D130. An analysis of the respiratory stimulant effect of physostigmine and neostigmine in the conscious rabbit.

M. Weinstock, D. Roll & Y. Zillberman

Department of Pharmacology & Experimental Therapeutics, Hebrew University Hadassah School of Medicine, Jerusalem Israel.

Clinical & Experimental Pharmacology & Physiology, 8, 151, (Mar./April 81)

R81D131. Combined treatment with sustained release theophylline and beta-adrenoceptor-stimulating agents in chronic childhood asthma.

G. Lonnerholm, T. Foucard & B. Lindstrom

Department of Drugs, National Board of Health & Welfare, Uppsala, Sweden.

British Medical J., **282**, 1029 (28 Mar 81)

R81D132. Dose related bronchoconstriction with methacholine in rats as modified by terbutaline alone and in combination with theophylline.

R. O. Salonen & M. J. Mattila

Department of Pharmacology, University of Helsinki Sittavuorenpenker 10, SF-00170 Helsinki 17, Finland.

Acta Pharmacologica et Toxicologica, **48**, 193 (Mar 81)

R81D133. Effects of tartrazine on different contractile stimuli in guinea pig tracheal muscle.

S. E. Hedman & R. G. G. Andersson

Department of Pharmacology, Linköping University, S-158185 Linköping, Sweden.

Acta Pharmacologica et Toxicologica, **48**, 101 (Feb. 81)

R81D134. Inhibition by clinically used dyes of prostaglandin in rat and human lung.

Y. S. Bakhle

Department of Pharmacology, Institute of Basic Medical Sciences, Royal College of Surgeons of England, Lincoln's Inn Fields, London WC2A 3PN.

British J. of Pharmacology, **72**, 715 (April 81)

R81D135. Ontogenesis of uptake and deamination of 5-hydroxy tryptamine, dopamine and β -phenylethylamine in isolated perfused lung and lung homogenates from rats.

R. R. Ben-Harari & M. B. H. Youdim

Department of Pharmacology, Faculty of Medicine, Technion, 12, Haalyah Street, Bat Galim, P. O. Box 9649, Haifa, Israel.

British J. of Pharmacology, **72**, 731 (April 81)

R81D136. Peroxisomal respiration and energy conservation: Possible relationships between heart production, thermosmosis and conformational changes.

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St. Lucke's Roosevelt Hospital Center, Department of Obstetrics & Gynecology, 428 West 59th Street, New York, NY 10019, USA.

FEBS Letters, **128**, 1 (1 June 81)

R81D137. The problems of sleep-related respiratory disorders.

R. J. Martin

National Jewish Hospital & Research Center, National Asthma Center, The Institute for Respiratory & Immune Disease, Denver.

J. of the American Medical Association, **245**, 1250 (27 Mar. 81)

R81D138. Thrombolysis by human tissue plasminogen activator and urokinase in rabbits with experimental pulmonary embolus.

O. Matsuo, D. C. Rijken & D. Collen

Center for Thrombosis and Vascular Research, Department of Medical Research, University of Leuven, Belgium.

Nature, **291**, 590 (18 June 81)

E GASTROINTESTINAL DISORDERS

R81E044. Effects of new sulfonamide molecules on rat gastric acid secretion.

R. Colombo, A. Pinelli, & Muserra Grandi

Department of Pharmacology & St. Raphael Hospital Research, Department University of Milan, I-20129, Milan, Italy.

Pharmacological Research Communication, **13**, 525 (May 81)

R81E045. Gastrointestinal bleeding detected with 99m TC-labelled erythrocytes.

M. Dyrbye & S. L. Nielsen

Department of Clinical Physiology, Gentofte Hospital, DK-2900 Hellerup.

Danish Medical Bulletin, **28**, 34 (Mar 81)

R81E046. A study on the penicillan induced gastric ulceration of the rat.

B. Gupta, R. K. Srivastava, K. K. Saxena & D. N. Prasad

Department of Pharmacology, L. L. R. Medical College, Meerut-250 102.

Indian J. of Pharmacology, **12**, 247 (Oct-Dec. 80)

F METABOLIC AND DEGENERATIVE DISORDERS

R81F218. Abnormal innervation of lower limb epineurial arterioles in human diabetes.

N. M. Grover-Johnson, F. G. Baumann, A. M. Imparato G. E. Kim & P. K. Thomas

Department of Pediatrics, NYU Medical Center, 550 First Avenue, New York, N. Y. 10016, USA.

Diabetologia, **20**, 31 (Jan. 81)

R81F219. Adrenergic influence on glucocounter-regulation in man.

U. Lilavivat, R. G. Brodows & R. Cambell.

University of Rochester, School of Medicine and Dentistry, Endocrinology Metabolism Unit, Monroe Community Hospital, 435 East Henrietta Road, Rochester, NY 14603, USA.

Diabetologia, **20**, 482 (April 81)

R81F220. Adrenergic mechanisms in the hyperglycaemia and hyperinsulinaemia of diabetic KK mice.

K. Fujimoto, T. Sakaguchi & M. Ui*

Department of Physiological Chemistry,
Faculty of Pharmaceutical Sciences,
Hokkaido University, Sapporo, Japan

Diabetologia, **20**, 568 (May 81)

R81F221. Anemia associated with lactic acidosis.

W. Druml, G. Kleinberger, K. Hruby, J. Slany & E. Neumann

I. Medizinische University Klinik, A-1090
Wien, Lazarettgasse 14, Austria.

Acta Haematologica, **65**, 10 (1981)

R81F222. Anticholinesterase effect of isotalol.

M. Alkondon, S. P. Sivam, S. Bhatia & P. Sen*

Department of Pharmacology, University
College of Medical Sciences, Ring Road
New Delhi-110 029.

Indian J. of Medical Research, **73**, 796 (May 81)

R81F223. Changes in carbohydrate metabolism in various organs of the mail *Lymanea acuminata* following exposure to trichlorfon.

V.K. Mahendru & R. A. Agarwal

Department of Zoology, University of
Gorakhpur, Gorakhpur-273 001.

Acta Pharmacologica et Toxicologica, **48**, 377
(May 81)

R81F224. Chenodeoxycholic acid: A review of its pharmacological properties and therapeutic use.

J. H. Iser & A. Sali

Department of Veterans Affairs, Repatriation General Hospital, Banksia St.
Heidelberg, West Victoria 3081, Australia.

Drugs, **21**, 90 (Feb 81)

R81F225. Cholesterol, bile acid & bile salt adsorption to bran *in vitro*.

G. Salvioli, R. Salati, M. Pastorello & A. Gibertini

Department of Internal Medicine,
Cattedra di gerontologia Geriatria,
University of Modena Via del Pozzo, 71

Pharmacological Research Communications, **13**,
413 (April 81)

R81F226. Chronic liver disease in transfusion-dependent thalassemia: Liver iron quantitation & distribution.

S. De Virgillis, G. Cornacehia, G. Sanna, F. Argioli, R. Galanello, G. Fiorelli, M. Rais, P. Cossu, F. Bertolino & A. Cao*

11a Clinica Pediatrica, Via Porcell, 1-I-
09100 Cagliari, Italy.

Acta Haematologica, **65**, 32 (1981)

R81F227. A comparison between the natriuretic response to potassuim in lithium and amelorode-treated rats.

O. V. Olesen & K. Thomsen

Psychopharmacology Research Unit,
Aarhus University Institute of Psychiatry
Psychiatric Hospital, DK-8240 Risskov,
Denmark.

Acta Pharmacologica et Toxicologica, **48**, 382
(May 81)

R81F228. Diabetes in adolescence.

R. B. Tattersall & J. Lowe

Diabetic Department, Queen's Medical
Centre, Nottingham University Hospital
Nottingham, NG 72UH, UK

Diabetologia, 20, 517 (May 81)

R81F229. Diabetes in identical twins—A study of 200 pairs.

A. H. Barnett, C. Eff, R. D. G. Leslie, & D. A. Pyke*

Diabetic Clinic, Kings' College Hospital,
London SE5 9RS, England.

Diabetologia, 20, 87 (Feb 81)

R81F230. Dietary regulation of insulin receptors in obesity.

R. I. Misbin

Division of Endocrinology, Box J. 226
University of Florida College of Medicine,
Gainesville, FL 32610

J. Nutrition 111, 475 (March 81)

R81F231. Diets rich in natural fibre improve carbohydrate tolerance in maturity-onset, non-insulin dependent diabetes.

R. M. Kay, W. Grobin & N. S. Track

Lab. 1.23, Toronto Western Hospital 399
Bathurst Street, Ontario, Ontario M5T
258, Canada.

Diabetologia, 20, 18 (Jan. 81)

R81F232. Do colonic bacteria contribute to cholesterol gall-stone formation? Effects of lactulose on b

J. R. Thornton & K. W. Heaton

University Department of Medicine
Bristol Royal Infirmary, Bristol, BS28HV

British Medical J., 282, 1018 (2
March 81)

R81F233. Effect of a new hypoglycaemic agent (HB699) on the *in vivo* secretion of pancreatic hormones in the dog.

G. Ribes, E. R. Trimble, J. P. Blayac, C. B. Wollheim, R. Puech & M. M. I. Mariani*

Laboratoire de Pharmacologie et Pharmacodynamie Institut de Biologie Bd Henri IV F.34060 Montpellier, Cedex, France.

Diabetologia, 20, 501 (April 81)

R81F234. The effect of fenfluramine on the microstructure of feeding and drinking in the rat.

M. J. Burton, S. J. Cooper & D. A. Popplewell*

Laboratory of Experimental Physiology
University of Sussex, Brighton, BN1 9QG

British J. Pharmacology, 72, 621 (April 81)

R81F235. The effect of intravenous insulin infusion on kidney function in insulin dependent diabetes mellitus

J. Sandahl Christensen, M. Frandsen & H. H. Parving

Steno Memorial Hospital DK 281
Gentofte, Denmark.

Diabetologia, 20, 199 (March 81)

R81F236. Effect of starvation & insulin treatment on glycogen synthase D and synthase D phosphatase activity in rat heart.

M. C. Gannon, A. W. H. Ten & F. Q. Nuttall

Endocrine Section, V. A. Medical Center, Minneapolis, MN55417, USA

Molecular & Cellular Biochemistry, **34**, 31 (20 Jan 81)

R81F237. Effects of calcium and calcitonin on circulating levels of glucagon and glucose in diabetes mellitus.

A. Starke, E. Keck, M. Berger & H. Zimmermann

Medizinische Klinik E. der Universität Moorenstrabe 5, D-4000 Düsseldorf 1. F. R. G.

Diabetologia, **20**, 547 (May 81)

R81F238. Effects of cooking on serum glucose and insulin responses to starch.

P. Collings, C. Williams & I. Macdonald*

Department of Physiology, Guy's Hospital Medical School, London, SE 19RT.

British Medical J., **282**, 1032 (28 March 81)

R81F239. Effects of dietary fibre supplementation in stable and labile insulin-dependent diabetes.

L. H. Monnier, M. J. Blotman, C. Colette, M. P. Monnier & J. Mirouze

Department of Metabolic and Endocrine Diseases Hospital Saint-Eloi F 34059 Montpellier, Cedex, France.

Diabetologia, **20**, 12 (Jan. 81)

R81F240. Epidermal growth factor receptors.

E. D. Adamson & A. R. Rees

Department of Zoology, Laboratory of Molecular Biophysics, University of Oxford, South Parks Road Oxford OX13PS Great Britain.

Molecular & Cellular Biochemistry, **34**, 129 (11 Feb 81)

R81F241. Factors affecting induction of tyrosine aminotransferase in isolated rat liver cells.

F. A. O. Marston, A. J. Diekson & C. I. Pogson

Biological Laboratory, University of Kent, Canterbury, Kent, CT29BT, Great Britain.

Molecular & Cellular Biochemistry, **34**, 59 (20 Jan 81)

R81F242. The fetal and maternal catecholamine response to insulin-induced hypoglycemia in the rat.

M. Phillippe & J. L. Kitjmillier

Department of Obstetrics and Gynecology, Brigham and Women's Hospital, 221 Longwood AVE, Boston, Massachusetts 02115

American J. of Obstetrics and Gynecology, **139**, 407 (15 Feb. 81)

R81F243. Fetal metabolic response to endogenous insulin release.

A. F. Philipps, J. W. Dubin & J. R. Raye

Department of Pediatrics, Division of Neonatology, The University of Connecticut Health Center, Farmington, Connecticut 06032.

American J. of Obstetrics and Gynecology, **139**, 441 (15 Feb 81)

R81F244. Fibrinogen derivatives in plasma.

D. A. Lane

Department of Haematology, Charing Cross Hospital Medical School, Fulham Palace Road, London W68RF.

British J. of Haematology, **47**, 329 (March 81)

R81F245. Glycosylated haemoglobin levels in a colony of spontaneously diabetic rabbits.

D. J. Cannon & H. H. Conaway

VA Medical Center, 300 East Roosevelt Road, Little Rock, AR 72206 USA.

Diabetologia, **20**, 242 (March 81)

R81F246. Haloperidol and insulin release

F. Lechin & B. Vander Dijis

Catedra de Patologia General y Fisiopatologia Instituto de Medicina Experimental, Dept. de Bioquimica Escuela de Bioanalisis Facultad de Medicina, Universidad Central de Venezuela Apartado 80983, Caracas 1080 A Venezuela.

Diabetologia, **20**, 78 (Jan. 81)

R81F247. Hormonal and metabolic effects of chlorpropamide, glibenclamide and placebo in a cross-over study in diabetes not controlled by diet alone.

P. H. Sonksen, C. Lowy, R. J. Perkins & T. E. T. West

St. Thomas Hospital, London SE17EH England.

Diabetologia, **20**, 22 (Jan. 81)

R81F248. How vitamin B₁₂ acts.

I. Chanarin, R. Deacon, J. Perry & M. Lumb

M. R. C. Clinical Research Centre, Harrow, Middx HA13UJ (UK)

British J. of Haematology, **47**, 487 (April 81)

R81F249. Influence of mustard oil on cholesterol-induced atherosclerosis in albino rabbits.

C. P. Thankur & S. C. Kumar

Department of Medicine, Patna Medical College, Patna.

Atherosclerosis, **39**, 437 (June 81)

R81F250. Influences of fatty acids and lipids from biological sources on the *in vitro* biosynthesis of prostaglandin 1₂ (PGI₂).

J. Beitz, H. U. Block, P. Hoffman & W. Forster.

Department of Pharmacology & Toxicology Martin Luther University, Halle-Wittenberg, 401 Halle, GDR

Pharmacological Research Communications, **13**, 363 (April 81)

R81F251. Insulin-induced hypoglycemic coma and regional cerebral energy metabolism.

D. W. McCandless

Department of Neurobiology & Anatomy,
The University of Texas Medical School
of Houston, P. O. Box 20708 Houston,
Texas 77025 (USA).

Brain Research, **215**, 225 (29 June 81)

R81F252. The insulinotropic activity of *Gymnema sylvestre*, R. Br. An Indian medical herb used in controlling diabetes mellitus.

K. R. Shanmugasundaram, C. Panneerselvam, P. Samudram & E. R. B. Shanmugasundaram

Department of Biochemistry, Post-Graduate Institute of Basic Medical Sciences, University of Madras, Taramani Campus, Madras-600 042.

Pharmacological Research Communications, **13**, 475 (May 81)

R81F253. Insulin secretion by the transplanted neonatal pancreas during food intake in fasted and fed rats.

J. H. Strubbe & P. VanWachem

Department of Zoology, State University of Groningen P. O. Box 14, 9750 A. A. Haren, The Netherlands.

Diabetologia, **20**, 228 (March 81)

R81F254. Interaction between arsenic and alloxan induced diabetes—effects on rat urinary enzyme levels.

C. M. Schiller, R. Walden & B. A. Fowler

Laboratory of Organ Function and Toxicology, National Institute of Environmental Health Sciences, Research Triangle Park, NC 27709 USA.

Biochemical Pharmacology, **30**, 168 (15 June 81)

R81F255. *In vitro* biotransformation of pyrazinamide by rat liver: identification of new metabolite.

D. Pitre, R. M. Facino, M. Carini & A. Carlo

Laboratori Ricerche Braeco Industria Chimica Via Folli 50. 20134 Milano.

Pharmacological Research Communications, **13**, 351 (April 81)

R81F256. Isoamylases in diabetes mellitus.

J. Skrha, J. Stepan*, T. Havranek, F. Skrha, K. Herfort, J. Sramkova & J. Pav

3rd Department of Internal Medicine U. nemocnice 1, CS 12800 Praha, Czechoslovakia.

Diabetologia, **20**, 129 (Feb. 81)

R81F257. Keeping in step: Does exercise benefit the diabetic?

R. S. Sherwin & V. Koivisto

Yale University School of Medicine, P. O. Box 3333, 333 Cedar St., New Haven, CT 06510, USA.

Diabetologia, **20**, 84 (Feb. 81)

R81F258. KROC-Symposium F "The nervous system and metabolism"
santa Ynez Valley, California, USA,
21st to 25th April 1980.

Diabetologia, **20**, Supplement, 245 (March 81)

R81F259. Lack of effect of vanadyl trichloride on hepatic drug metabolism in the rat.

K. R. Earnshaw, R. J. Vetter, G. G. Stebbins & R. C. Schnell

Department of Bionucleonics, Purdue University, West Lafayette, IN47907.

Pharmacological Research Communications, **13**, 323, (April 81)

R81F260. Lipogenic responses to dietary glucose in selected rat adipose tissues.

R. Kannan & N. Bakar

Tumor-Lipid Laboratory, Research Service, Veterans Administration Wadsworth Medical Centre, Los Angeles California 90073.

Indian J. of Biochemistry & Biophysics, **18**, 47 (Feb. 81)

R81F261. Liposome-encapsulated desferriox-amine in experimental iron overload.

E. H. Lau, E. A. Cerny & Y. E. Rahman

Argonne National Laboratory, Argonne IL60439, USA.

British J. of Haematology, **47**, 505 (April 81)

R81F262. Mechanism of action of insulin analogues. A comparison of the hepatic and peripheral effects on glucose turnover of insulin, proinsulin and three insulin analogues modified at positions A & B.

C. V. Tompkins, D. Brandenburg, R. H. Jones* P. H. Sonksen

Department of Medicine, St. Thomas Hospital Medical School, London SE17EH UK.

Diabetologia, **20**, 94 (Feb. 81)

R81F263. The mechanism of action of the hypocholesterolemie drug P (1-adamantyloxy) aniline.

B. D. Rush, M. J. Ruwart & C. E. Day

Research Laboratories, The Upjohn Company Kalamazoo, Michigan 49001 US.

Atherosclerosis, **39**, 345 (June 81)

R81F264. The metabolic response to hyperglycaemic clamping in insulin-dependent diabetes.

R. Nosadini, G. A. Noy, K. G. M. M. Alberti*, A. Hodson & H. Orskoy

Department of Clinical Biochemistry and Metabolic medicine, Newcastle upon Tyne NE14LP, England.

Diabetologia, **20**, 113 (Feb. 81)

R81F265. The milieu interieur and the islets of langerhans.

R. H. Unger

Veterans Administration Medical Center and The University of Texas Health Science Center at Dallas, Dallas, Texas, USA.

Diabetologia, **20**, 1 (Jan. 81)

R81F266. Pancreas and islet transplantation. I. Experimental studies.

D. E. R. Sutherland

Department of Surgery, University of Minnesota Hospitals 420 Delaware, St. S. E. Minneapolis, MN55455, USA.

Diabetologia, **20**, 161 (March 81)

R81F267. Pancreas and islet transplantation. II. Clinical trials.

D. E. R. Sutherland

Box 253, Mayo Memorial Building, University of Minnesota Hospital, 420, Delaware St. S. E. Minneapolis, MN55455 USA.

Diabetologia, **20**, 435 (April 81)

R81F268. Plasmas, exchange for hypercholesterolaemia.

G. R. Thompson

M. R. C. Lipid Metabolism Unit, Hammer-Smith Hospital, London, W120-HS, UK.

Lancet, **I**, 1246 (6 June 81)

R81F269. Possible involvement of the cholinergic system in hormonal secretion by the perfused pancreas from ventromedial-hypothalamic lesioned rats.

F. R. Jeansrenaud & B. Jeanrenaud

Laboratoires de Recherches Metaboliques, 64, Avenues de la Roseraie CH-1205 Geneva, Switzerland.

Diabetologia, **20**, 217 (March 81)

R81F270. Previous exposure to glucose enhances somatostatin secretion from the isolated perfused rat pancreas.

V. Grill, M. Rundfeldt & S. Efendie

Department of Endocrinology Karolinska Sjukhuset, S/10401 Stockholm 60, Sweden.

Diabetologia, **20**, 495 (April 81)

R81F271. Reduced glycosuria during guar gum supplementation in non-insulin dependent diabetes. A double-blind, randomised cross-over study.

K. H. Stokholm, K. B. Lauritsen & S. Larsen

Division of Endocrinology, Department of Internal Medicine, Hvidovre Hospital, DK 2650 Hvidovre, Denmark.

Danish Medical Bulletin, **28**, 41 (March 81)

R81F272. Regulation of plasma ferritin by the isolated perfused rat liver.

U. Mack, W. G. E. Cooksley, R. A. Ferris, L. W. Powell & J. W. Halliday

Department of Medicine and Biochemistry, University of Queensland, Royal Brisbane Hospital, Brisbane, Australia.

British J. of Haematology, **47**, 403 (March 81)

R81F273. Response of white adipocyte of mouse and rabbit to catecholamines & ACTH-I.

Chien-chung Fan & Ren-jye HO

Department of Biochemistry University of Miami School of Medicine, P. O. Box 016129, Miami, FL 33101 USA

Molecular & Cellular Biochemistry, **34**, 35 (20 Jan. 81)

R81F274. Response of white adipocyte of mouse and rabbit to catecholamines and ACTH-II.

Chien-chung Fan & Ren-jye HO

Department of Biochemistry, University of Miami School of Medicine, P. O. Box 06129 Miami, FL 33101, USA

Molecular & Cellular Biochemistry, **34**, 43 (20 Jan 81)

R81F275. Response of white adipocyte of mouse & rabbit to catecholamines and ACTH-III

Chien-Chung Fan & Ren-jye HO

Department of Biochemistry, University of Miami School of Medicine, P. O. Box 016129, Miami, FL33101, USA.

Molecular & Cellulur Biochemistry, **34**, 51 (20 Jan. 81)

R81F276. The risks of asymptomatic hyperuricaemia and the use of uricosuric diuretics.

M. W. Johnson & W. E. Mitch

Clinical Pharmacology Division, Department of Medicine Brigham and Women's Hospital 75 Francis Street, Boston, Massachusetts 02115 (USA)

Drugs, **21**, 220 (March 81)

R81F277. Serum triglycerides to be or not to be a risk factor for ischaemic heart disease?

L. A. Carlson & L. E. Bottiger

King Gustaf V. Research Institute and Department of Internal Medicine, Karolinska Hospital, Slockholm, Sweden.

Atherosclerosis, **39**, 287 (June 81)

R81F278. Short-term stimulation of net glycogen production by insulin in rat hepatocytes.

F. Nyfeler, P. Fasel & P. Walter

Department of Biochemistry, University of Basel, Vesalinum, Vesalgasse 1. CH-4501, Basel, Switzerland.

Biochemica et Biophysica Acta, **675**, 17 (11 June 81)

R81F279. A study of the thermogenic effect of ethanol in the hypothermic rat.

M. F. M. James, A. A. Vander Berg, N. A. French & J. F. White

Department of Anaesthetic, P. O. Box A 178, Avondale, Salisburg, Zimbabwe.

Clinical and Experimental Pharmacology & Physiology, **8**, 119 (March/April 81)

R81F280. Synthesis and hypoglycemic activity of tolbutamide amine complexes.

S. B. Rijhwani, R. K. Upadhyay & C. S. Chauhan

Department of Chemical Technology, University of Bombay, Matunga, Bombay-400 019

Indian Drugs, **18**, 234 (April 81)

R81F281. Synthesis of hypoglycemic activity of some new substituted alphonylbiguanides.

M. Imtiaz Husain & K. B. Gupta

Department of Chemistry, Lucknow University, Lucknow-226 007.

Indian J. of Pharmaceutical Sciences, **43**, 44 (March-April 81)**R81F282. Treatment of a type II diabetic by a totally implantable insulin infusion device.**

B. Buchwald, J. Barbosa, R. L. Varco, T. D. Rohde, W. M. Rupp, R. A. Schwartz, F. J. Goldenberg, T. G. Rublein & P. J. Blackshear

Box 290, University of Minnesota Hospitals, Minneapolis, Minnesota 55455, USA.

Lancet I, 1233 (6 June 81)**R81F283. Type I (insulin dependent) diabetes mellitus. Is there strong evidence for a non-HLA linked gene?**

B. K. Suarez & P. Van Eerdewegh

Department of Psychiatry, Washington University School of Medicine, The Jewish Hospital of St. Louis, St. Louis, MO 63110, USA.

Diabetologia, **20**, 524 (May 81)**G INFECTIOUS DISEASES****Viral****R81G165. A serological study of cytomegalovirus infection at Lucknow.**

A. Mathus, I. Jindal & U. C. Chaturvedi

C11/7, River Bank Colony, Lucknow 226 001.

Indian J. of Medical Research, **73**, 678 (May 81)**R81G166. Serum immunoglobulins G, M and A in acute viral hepatitis.**

S. S. Kelkar, W. Warawdekar & K. Dhunjibhoy

Department of Microbiology, Grant Medical College, Bombay-400 008.

Indian J. of Medical Research, **73**, 673 (May 81)**Bacterial****R81G167. Autochthonous and pathogenic colonization of animal tissues by bacteria.**

K. J. Cheng, R. T. Irvin & J. W. Costerton

Agriculture Canada Research Station, Lethbridge, Alta, Canada, T1J4B1.

Canadian J. of Microbiology, **27**, 461 (May 81)**R81G168. A cost-benefit analysis of immunization for pneumococcal pneumonia.**

K. M. Patrick, & F. R. Woolley

Department of Family and Community Medicine, Division of Community Medicine, University of Utah Medical Center, 50 N Medical Dr. Salt Lake City VT 84132.

J. American Medical Association, **245**, 473 (6 Feb. 81)

R81G 169. Hemagglutination by
Neisseria meningitidis.

I. E. Salit

Division of Infections Disease, Toronto
General Hospital, Toronto, Ont. Canada
M5G1L7.

Canadian J. of Microbiology, **27**, 586
(June 81)

R81G170. Immunological studies in
tuberculosis.

V. K. Perumal

New Delhi Tuberculosis Centre, Jawahar
Lal Nehru Marg, New Delhi-110 002.

Indian J. of Tuberculosis, **XXIII**, 58 (April
81)

R81G171. Pneumococcal vaccine: To
use or not.

D. W. Fraser & C. V. Broome

Center for Disease Control, Atlanta, USA.

J. of the American Medical Association, **245**,
498 (6 Feb. 81)

R81G172. A study of drug resistance
among *Salmonella typhi* and *Salmonella*
***paratyphi* in an endemic area 1977-79.**

R. S. Rao, T. Sundararaj, S. Subramnian,
V. Shankar, S. A. N. Murty & S. C.
Kapoor

Department of Microbiology, Post-gra-
duate Institute of Basic Medical Sciences,
University of Madras, Taramani, Madras-
600 642.

Transactions of the Royal Society of Tropical
Medicine & Hygiene, **75**, 21 (1981)

Parasitic

R81G173. Effect of specific and non
specific prior sensitization on the
outcome of amoebic infection.

P. Jain, S. Sawhney & V. K. Vinayak

Division of Experimental Parasitology
Department of Experimental Medicine
Post-graduate Institute of Medicine
Education and Research, Chandigarh
160 012.

Transactions of the Royal Society of Tropical
Medicine & Hygiene, **75**, 25 (1981)

R81G174. *Entamoeba histolytica* and *Giardia*
***lamblia*: Growth responses to reducing**
agents.

F. D. Gillin & L. S. Diamond

Laboratory of Parasitic diseases, National
Institute of Allergy & Infections Diseases
National Institutes of Health, Bethesda
Maryland 20205, USA.

Experimental Parasitology, **51**, 382 (June
81)

R81G175. Virulence of *Entamoeba*
***histolytica* in rat and its comparison**
with the serological responses of the
amoebic patients.

V. K. Vinayak, S. Sawhney, P. Jain, S.
Chug, S. R. Naik & R. N. Chakravarti

Division of Experimental Parasitology
Department of Experimental Medicine
Post-graduate Institute of Medicine
Education and Research, Chandigarh
160 012.

Transactions of the Royal Society of Tropical
Medicine & Hygiene, **75**, 32 (1981)

R81G176. Malaria infection presenting with symptoms of thyroid insufficiency and amenorrhoea.

F. M. Feinsod & G. Heinrich

Department of Internal Medicine,
Cleveland Metropolitan General Hospital
3395, Scranton Road, Cleveland OH 44105
USA.

*Transactions of the Royal Society of Tropical
Medicine & Hygiene*, **75**, 117 (1981)

R81G177. Atypical reticulocytes in rats with malaria as a possible consequence of the pitting function of the spleen.

C. E. Tosta.

Department of Pathology, Royal College
of Surgeons of England, Lincoln's Inn
Felids, London WC2A3PN, UK.

Annals of Tropical Medicine & Parasitology,
75, 363 (June 81)

R81G178. Chloroquine-resistant falciparum malaria from East-Africa.

T. Pettersson, H. Kyronseppa & T.
Pitkanen

Department of Medicine and Tropical
Diseases, Aurora Hospital, Nordenskiöldin-
katu, 20, 00250 Helsinki 25, Finland.

*Transactions of the Royal Society of Tropical
Medicine & Hygiene*, **75**, 112 (1981)

R81G179. The distribution of *Plasmodium falciparum* in the peripheral blood and bone marrow of Gambian children.

M. E. Smalley, S. Abdalla & J. Brown

Medical Research Council Laboratories,
Fajara, P. O. Box 273, Near Banjul, The
Gambia, West Africa.

*Transactions of the Royal Society of Tropical
Medicine & Hygiene*, **75**, 103, (1981)

R81G180. *Plasmodium berghei*: Glycolytic enzymes of the infected mouse erythrocyte.

W. C. Kruckeberg, B. J. Sander & D. C.
Sullivan

University of Mississippi Medical Center,
Department of Preventive Medicine, 2500,
North State Street, Jackson, Mississippi,
39216, U. S. A.

Experimental Parasitology, **51**, 438 (June 81)

R81G181. *Plasmodium falciparum*: assay in vitro for inhibitors of merozoite penetration of erythrocytes.

M. M. Weiss, J. D. Oppenheim & J. P.
Vanderberg

Division of Parasitology, New York,
University Medical Centre 550 First
Avenue, New York, N. Y. 10016, USA.

Experimental Parasitology, **51**, 400 (June 81)

R81G182. *Plasmodium hermani*: experimental transmission by *Culex salinarius* and comparison with other susceptible florida mosquitoes.

J. K. Nayar, M. D. Young & D. J. Forrester

Florida Medical Entomology Laboratory,
IFAS-University of Florida, P. O. Box.
520 Vero Beach, Florida, 32960 USA.

Experimental Parasitology, **51**, 431 (June
81)

R81G183. *Plasmodium lophurae*: immunization of pekin ducklings with different antigen preparations.

V. McDonald, M. H. Hannon, L. Tanigoshi & I. W. Sherman

Department of Biology, University of California, Riverside, California, 92521, USA.

Experimental Parasitology, **51**, 195 (April 81)

R81G184. Active immunization and passive transfer of resistance against sporozoite induced malaria in infant mice.

A. U. Orjih, A. H. Cochrane & R. S. Nussenzweig

Division of Parasitology, Department of Microbiology, New York University School of Medicine, 550, First Avenue, N. Y. 10016, USA.

Nature, **291**, 331 (May 81)

R81G185. The *in vitro* cultivation of members of the *Leishmania braziliensis* complex.

J. J. Shaw & R. Lainson

Department of Parasitology, Instituto Evandro Chagas, Belem 66000, Para, Brazil.

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 127 (No. 1, 1981)

R81G186. *Leishmania tropica*: biochemical aspects of promastigotes attachment to macrophages *in vitro*.

A. Zenian

Department of Microbiology and Public Health, Michigan State University, Lansing, Michigan 48824, USA.

Experimental Parasitology, **51**, 175 (April 81)

R81G187. A novel location for two enzymes of de novo pyrimidine biosynthesis in trypanosomes and *Leishmania*.

D. J. Hammond, W. E. Gutteridge & F. R. Oppenheimer

Biological Laboratory, University of Kent, Canterbury, Kent, CT27N, England.

FEBS Letters, **128**, 27 (1 June 81)

R81G188. Chemical composition of the plasma membrane from epimastigote forms of *Trypanosoma cruzi*.

J. Franco Da Silveira & W. Colli*

Departamento de Bioquímica, Instituto de Química, Universidade de São Paulo, C. P. 20780, São Paulo (Brasil).

Biochimica et Biophysica Acta, **644**, 341 (June 81)

R81G189. Tissue reacting immunoglobulins in rhesus monkeys infected with *Trypanosoma cruzi*: a follow-up study.

A. Szarfman, D. Gerech, C. C. Draper & P. D. Marsden

Institute of Microbiology, Federal University of Rio de Janeiro (U. F. R. J.), Rio de Janeiro Brazil and Naval Medical Research Institute, Bethesda, Maryland 20014, USA.

Transactions of the Royal Society of Tropical Medicine & Hygiene, **75**, 114 (No. 1, 1981)

R81G190. *Trypanosoma brucei*: biochemical and morphological changes during in vitro transformation of bloodstream to procyclic—trypomastigotes.

E. J. Bienen, E. Hammadi & G. C. Hill

Department of Pathology, Graduate Program in Cellular & Molecular Biology, Colorado State University, Fort Collins, Colorado 80523, USA.

Experimental Parasitology, **51**, 408 (June 81)

R81G191. *Trypanosoma cruzi*: allopurinol in the treatment of mice with experimental acute changes disease.

J. L. Avis & A. Avila

Instituto Nacional de Dermatologia, Apartado 4043, Cara-Cas 101, Venezuela.

Experimental Parasitology, **51**, 204 (April 81)

R81G192. *Trypanosoma cruzi*: nucleotide and vitamin requirements of growing epimastigotes.

J. L. Avild & A. Avild

Center for Research and Training in Leprosy and Tropical Disease, Pan American Health Organization, Apartado 4043, Caracas 101, Venezuela.

Experimental Parasitology **51**, 318 (June 81)

R81G193. *Trypanosoma (Schizotrypanum) dionisii*, as a model for chemotherapeutic studies related to Chagas's disease.

J. R. Baker & Linda F. Selden.

The culture centre of Abgae and Protozoa (national Environment Research Council) 36, Storey's way, Cambridge CB3ODT, England.

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 80 (No. 1, 1981)

R81G194. Variant specific glycoproteins of *Trypanosoma equiperdum*: Cross reacting determination and chemical studies.

M. C. Labastie, T. Baltz, C. Richet Ch Giroud, G. Duvillir, R. Pautrizel & P. Degand

Unite de Recherche sur la Biochimie des proteines No 16 Inserm place de verdun 59045 Lilies cedex (France).

Biochemical and Biophysical Research Communication, **99**, 729 (31 March 81)

R81G195. Acute manifestations of mole genital filariasis in Enugu, Nigeria.

D. C. Nwafo, O. O. Mbonu & J. U. Egere
FRCS Department of Surgery, University of Nigeria. Enugu Campus, Enugu, Nigeria.

Annals of Trop Medicine and Parasitology, **75**, 323 (June 81)

R81G196. Antifilarial action of furazolidone.

S. Mirsa, R. K. Chatterjee* & A. B. Sen,

Division of Parasitology, Central Drug Research Institute, Lucknow 226 001.

Indian J. of Medical Research, **73**, 725 (May 81)

R81G197. Synthesis and study of new 2-(Substituted thiazolylphenyl amino) pyrido (3, 2-d) thiazoles as possible anthelmintic agents.

D. G. Kulkarani, S. R. Lokharde & B. G. Khadse*

Department of Chamotherapy, Haffkine, Institute, Bombay 400 012.

Indian J. of Pharmaceutical Sciences, **43**, 37 (Mar.-April 81)

R81G198. *Brugia pahangi*: development in *Aedes aegyti* reared axenically on a defined synthetic diet.

V. P. Sneller & R. H. Dadd

Department of Biology University of Notre Dame, Notre Dame, Indiana 46556 USA.

Experimental Parasitology, **51**, 169, (April 81)

R81G199. *Brugia pahangi*: growth improvement with lecithin in the diet of axenically reared hosts, *aedes aegyti*.

V. P. Sneller & R. H. Dadd

Department of Biology, University of Notre Dame. Indian 46556, USA.

Experimental Parasitology, **51**, 335 (June 81)

R81G200. *Brugia pahangi*: uptake and incorporation of nucleic acid precursors by microfilariae and macrofilariae *in vitro*.

S. N. Chen & R. E. Howells

Department of Parasitology, Liverpool School of Tropical Medicine, Pembroke Place, Liverpool L35QA England UK.

Experimental Parasitology, **51**, 296 (April 81)

R81G201. Enzyme linked immunosorbent assay (ELISA) for bancroftian filariasis.

P. Kabiraj, S. N. Ghirnikar & B. C. Harinath

Department of Biochemistry Mahatma Gandhi Institute of Medical Sciences, Sewagram, India 442 102.

Transactions of the Royal Society of Tropical Medicine & Hygiene, **75**, 119 (No. 1, 1981)

R81G202. Elimination of microfilariae (*Litomosoides carinii*, *Filarioides*) in the patent and in the immunized cotton rat.

B. Hass & P. Wenk

Institute of Tropical Medicine, Tubingen, German Federal Republic.

Transaction of the Royal Society of Tropical Medicine & Hygiene, **75**, 143 (No. 1, 1981)

R81G203. The anthelmintic effect of pyrantel pamoate, oxantel pyrantel pamoate, levamisole and mebendazole in the treatment of intestinal nematods.

B. Sinniah & D. Sinniah

Departments of Parasitology, University of Malaya, Kuala Lumpur, Malaysia.

Annals of Tropical Medicine and Parasitology, **75**, 315 (June 81)

R81G204. *Ascaris suum*: T. cell responses of C57BL/6J mice *in vitro* and *in vivo*.

L. Johnstone & R. Leventhal & E. J. L. Soulsby:

School of Veterinary Medicine, University of Pennsylvania, Philadelphia, Pennsylvania 19104, USA.

Experimental Parasitology, **51**, 243 (April 81)

R81G205. Distribution and abundance of intestinal helminths in man in westron papua new guinea with special reference to strongyloides.

R. W. Ashford, A. J. Hall & D. Babona

Department of Parasitology, Liverpool School of Tropical Medicine, Pembroke Place, Liverpool L350QA.

Annals of Tropical Medicine and Parasitology, **75**, 269 (June 81)

R81G206. Hookworm infection in rural Gambia seasonal changes, morbidity and total IgE levels.

R. Knight & T. G. Merrett

Department of Tropical Medicine, Liverpool School of Tropical Medicine, Pembroke Place, Liverpool L35QA.

Annals of Tropical Medicine and Parasitology, **75**, 299 (June 81)

R81G207. Intestinal parasite infections of man in Tasmania.

J. M. Goldsmid

Department of Pathology, University of Tasmania, Hobart, Tasmania.

Transactions of the Royal Society & Tropical Medicine and Hygiene, **75**, 110 (No. 1, 1981)

R81G208. Identification and partial purification of an antigen (W_1) from, *Schistosoma mansoni* eggs which is putatively hepatotoxic in T. Cell deprived mice.

D. W. Dunne, S. Lucas, Q. Bickle, S. Pearson, L. Madgwick, J. Bain & M. J. Doenhoff

London School of Hygiene and Tropical Medicine, Winches from Field Station, St. Albans, Herts, England AL 40XQ.

Transactions of the Royl Society of Tropical Medicine and Hygine **V.75**, 54 (No. 1, 1981)

R81G209. Immunization of baboons with *Schistosoma mansoni* cercariae attenuated by gamma irradiation.

M. Stek Jr., P. Minard, D. A. Dean & J. E. Hall

U. S. Naval Medical Research Institute, Bethesda, Maryland 20014.

Science, **212**, 1518 (26 June 81)

R81G210. Immunological of control hepatotoxicity and parasite egg excretion in *Schistosoma mansoni* infections: stage specificity of the reactivity of immune serum in T-cell deprived mice.

M. J. Doenhoff, S. Pearson, D. W. Dunne, Q. Bickle, S. Lucas, J. Bain, R. Musallam & Q. Hassounah

London School of Hygiene and Tropical Medicine, Winches form field Station, St. Albans, Herts, England AL40XQ.

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 41 (No. 1, 1981)

R81G211. *Schistosoma mansoni*: a complement dependent receptor on adult male parasites.

T. B. McGuinness & W. M. Kemp

Laboratory of Parasitology, Department of Biology, Texas A & M University, College Station, Texas 77843, USA.

Experimental Parasitology, **51**, 236 (April 81)

R81G212. *Schistosoma mansoni*: complement activation by antigenic preparations.

J. G. Van Egmond, A. M. Deelder & M. R. Daha

Laboratory of Parasitology, Medical Faculty, Leiden University, Raperburg 33, Leiden, The Netherlands.

Experimental Parasitology, **51**, 188 (April 81)

R81G213. *Schistoroma mansoni*: ultrastructure of early transformation of skin-and shear-pressure-derived schistosomes.

C. E. Cousin & M. A. Stirewalt & C. H. Dorsey

University of the District of Columbia, 1331 H Street N. W., Washington, DC20085, USA.

Experimental Parasitology, **51**, 341 (June 81)

R81G214. Serodiagnosis of human *Schistosoma mansoni* infections: enhanced sensitivity and specificity in ELISA using a fraction containing *S. Monsoni* egg antigens W_1 and α_1 .

M. L. McLaren, J. E. Lilly white, D. W. Dunne & M. J. Doenhoff

Ross Institute London School of Hygiene & Tropical Medicine London WC 1E7HT

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 72 (No. 1, 1981)

R81G215. *Schistosoma mansoni*: complement and antibody damage mediated by human eosinophils and neutrophils in killing schistosomula in vitro.

J. R. McKean, ARE Anwar & A. Kay

Department of Pathology of University of Edinburgh Medical School, Teviot Place Edinburgh EH89 AG Schotland United Kingdom.

Experimental Parasitology, **51**, 307 (June 81)

R81G216. Age determination of mbiting population of *Culex pipiens fatigans* with particular reference to transmission of *Wuchereria bancrofti* in pond cherry.

P. K. Rajagopalan, M. Geetha Bai & N. Arunachalam,

Vector Central Research Centre, 5/3 Lenin Street Kosapalayam, Pondicherry 60.

Indian J. of Medical Research, **73**, 73 (May 81)

R41G217. Joint meeting with schweizerische Gesellschaft für Tropenmedizin und Parasitologie. Basel Switzerland, 12-15 March 1980 (Twenty papers)*.

Transaction of the Royal Society of Tropical Medicine and Hygiene, **75**, 133 (No. 1, 1981)

R81G218. Malumfashi endemic diseases research project, XVI The findings of a survey for *Schistosomiasis mansoni*, hookworm, giardiasis and nutritional status.

R. N. H. Pugh, J. W. Burrows & A. Bradley

Ministry of Health, P. O. Box 30377, Lilongwe, 3 Malawi.

Annals of Tropical Medicine and Parasitology, **75**, 281 (June 81)

R81G219. Mycoses in India-study in Madras.

A. Kamalam, A. S. Thambiah, M. Bugavandas & S. Govindaraju

Department of Dermatology, Madras Medical College & Government General Hospital and Department of Statistics, Madras, Christion College, Madras, India.

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 92 (No. 1, 1981)

R81G220. A new convenient synthesis of N, N-Bis (trimethylsilyl) arenesulfonamides.

V. D. Romanenko, V. I. Tovstenko, T. V. Pidvarko & L. N. Markovski*

Institute of Organic Chemistry, Academy of Sciences of the Ukrainian, SSR, 252660, Kiev USSR.

Synthesis, **No. 4**, 293 (April 81)

R81G221. Normal immunological responses in mice treated with chloroquine, quinine and primaquine.

Y. H. Theng, A. Ferranie & L. K. Secker

Department of Paediatrics, University of Adelaide, Adelaide Children's Hospital, North Adelaide, South Australia, 5006, Australia.

Transactions of the Royal Society of Tropical Medicine and Hygiene, **75**, 108 (No. 1, 1981)

H ANTINEOPLASTIC AGENTS

R81H047. Changes in the frequency of chromosome aberrations in the bone marrow of mice examined at various intervals after single-dose and continual exposures to cyclophosphamide.

R. J. Sram, V. S. Zhurkov, J. Novakova & I. Kodytokova

Institute of Hygiene and Epidemiology, 10042, Praha.

Folia Biologica, **27**, 58 (No. 1, 1981)

R81H048. Effects of trimethoprim on leukaemic cells *in vitro*.

G. E. Rivard, L. F. Monparier & R. L. Momparier

Division d' Hematologie-Oncologie et Centre de Recherche Pediatrique, Hospital Ste Justine, Montreal, Canada.

British J. of Haematology, **47**, 221 (Feb. 81)

R81H049. Eosinophilia in leukaemia.

A. Russo, S. Marino, A. Sciotta & G. Schiliro

Department of Pediatrics, University Catania, Catania, Italy.

British J. of Haematology, **47**, 324 (Feb. 81)

R81H050. HLA-A and HLA-B antigens in acute leukemia: A2-B12 phenotypes correlate with longer survival in acute myelogenous leukemia.

V. E. VonFleedner, Z. S. Khan & M. Jcannet

Transplantation Immunology Unit, Hospital Cantonal, Geneva, Switzerland.

Acta Haematologica, **65**, 73 (No. 2, 1981)

R81H051. HLA antigens and childhood acute lymphocytic leukaemia.

F. R. Davey, N. A. Lachant, N. L. Dock, C. Hubbell, J. A. Stockman III & J. B. Henry

Department of Pathology, SUNY Upstate Medical Center, 750 East Adams Street, Syracuse, New York 13210, USA.

British J. of Haematology, **47**, 211 (Feb. 81)

R81H052. In vitro synthesis of polypeptides encoded by the long terminal repeat region of mouse mammary tumour virus DNA.

C. Dickson, R. Smith & G. Petters

Imperial Cancer Research Fund Laboratories, P. O. Box 123, Lincoln's Inn Fields, London WC2A 3PK, UK.

Nature, **291**, 511 (11 June 81)

R81H053. The morphological classification of acute lymphoblastic leukaemia: concordance among observers and clinical correlations.

J. M. Bennett, D. Catovsky*, M. T. Danciel, G. Flandrin, D. A. G. Galton, H. R. Gralnick & C. Sultan.

MRC Leukaemia Unit, The Royal Postgraduate Medical School, Du Cane Road, London W120HS, UK.

British J of Haematology. **47**, 553 (Apr. 81)

R81H054. A pharmacologic and toxicological study of amygdalin.

C. G. Moertal, M. M. Ames, J. S. Kovach, T. P. Moyer, J. R. Rubin & J. H. Tinker

Comprehensive Cancer, Center Mayo Clinic, Rochester, MN 55901, USA.

J. of the American Medical Association, **245**, 591 (13 Feb. 81)

R81H055. Plasma cell acid phosphatase as an adjunct in the differential diagnosis of monoclonal immunoglobulinemias.

M. Tortarolo, N., Cantore, M. Grande, G. Buonanane & F. Dammacco

Division of Haematology, Ospedale Ascalesi S. Gennaro Naples & 2nd Medical Clinic, University of Bari, Bari, Italy.

Acta Haematologica, **65**, 103 (No. 2, 1981)

R81H056. Soularubinone, A new antileukemic quassinoid from *Soulamea tomentosa*.

M. V. Tri, J. Polonsky*, C. Meriene & T. Sevenet

Institut de Chimie des substances Naturelles, CNRS 91190 Gif-sur-Yvette, France.

J. Natural Products (Lloydia), **44**, 279 (May-June 81)

R81H057. A synthesis of B-2' deoxyshowdomycin.

A. M. Mubarak & D. M. Brown*

University of Chemical Laboratory, Cambridge, CB2 1EW, UK.

Tetrahedron Letters, **22**, 683 (No. 7, 1981)

R81H058. Use of the hemalog D automated leucocyte differential counter in the diagnosis, and therapy of leukaemia.

R. F. Hinchliffe, J. S. Lilleyman, N. F. Burrows & H. T. Swan

Department of Haematology, The Royal Hallamshire Hospital and Children's Hospital, Sheffield, England.

Acta Haematologica, **65**, 79 (No. 2, 1981)

BIOCHEMICAL PHARMACOLOGY

R81I121. Behaviour of normal and neoplastic rat cells on grooved substrates (cell migration/cell orientation/nuclear elongation).

P. Vesely, E. Matouskova, E. Krchnakova, Yu. A. Rovensky, I. L. Slavnya, V. I. Samoilov, Yu M. Vasiliev

Institute of Molecular Genetics, Czechoslovak Academy of Sciences 16000, Praha czechoslovak.

Folia Biologica, **27**, 51 (No. 1, 1981)

R81I122. Biogenesis of mitochondria. Defective assembly of the proteolipid into the mitochondrial adenosine 2 triphosphatase complex in an *Oli 2 mit* mutant of *Saccharomyces cerevisiae*.

G. Stephenson, S. Marzuki* & A. W. Linnane

Department of Biochemistry, Monash University, Clayton, Victoria 3168, (Australia).

Biochimica et Biophysica Acta, **636**, 104 (12 June 81)

R81I123. Biotransformation of xenobiotics in isolated dog hepatocytes.

G. Bolesfoldi, M. Johansson, B. Anderson, & P. Moldeus

Toxicology Laboratories, Astra Pharmaceuticals AB, S-15185 Sodertolje.

Acta Pharmacologica et Toxicologica, **48**, 227 (Mar. 81)

R811124. Cholera toxin can recouple hormone receptors that are uncoupled from adenylyl cyclase.

P. A. Insel, F. J. Darfler & M. S. Kennedy
Division of Pharmacology, Department
of Medicine, University of California, San
Diego, La Jolla, CA 92093, USA.

FEBS Letters, 128, 59 (1 June 81)

R811125. A comparative study of the effects of warfarin and brodifacoum on the relationship between vitamin K₁ metabolism and clotting factor activity in warfarin-susceptible and warfarin-resistant rats.

J. B. Leck & B. K. Park

Department of Pharmacology, The Uni-
versity of Liverpool, P. O. Box 147,
Liverpool, L 693 BK, UK.

Biochemical Pharmacology, 30, 123 (15 Jan 81)

R811126. Demonstration of a specific dynorphin receptor in guinea pig ileum myenteric plexus.

C. Chavkin & A. Goldstein

Addiction Research Foundation and
Departments of Pharmacology, Stanford
University, Palo Alto, California 94304, USA.

Nature, 291, 591 (18 June 81)

**R811127. Deuterium-isotope effect in the biotransformation of 4-ethyny-
lbiphenyls to 4-biphenylacetic acids
by rat hepatic microsomes.**

R. E. McMohan, J. C. Turner, G. W.
Whitakar, and H. R. Sullivan.

Lilly Research Laboratories Eli Lilly
Company, Indianapolis, Indiana 46206
USA.

*Biochemical and Biophysical Research Com-
munication*, 99, 662 (31 Mar. 81)

**R811128. Dexamethasone effects on
liver pyruvate kinase.**

M. L. Johnson, J. B. Hansen, J. J.
Donofrio & C. M. Veneziale*

Department of Cell Biology, Mayo
Medical School, Rochester, MN 55905
USA.

Biochimica et Biophysica Acta, 675, 107
(11 June 81)

**R811129. Dose dependent kinetics of
all-transretinoic acid in rats. Plasma
levels and excretion into bile, urine
and faeces.**

B. N. Swanson, C. A. Frolik, D. V.
Zaharevitz, P. P. Roller & M. B. Sporn

Clinical Pharmacology Unit, Main Build-
ing, Room No. 502, Thomas Jefferson
University, 11th & Walnut Sts., Philadel-
phia, PA 19107, USA.

Biochemical Pharmacology, 30, 107
(Jan. 81)

**R811130. *Echinococcus multilocularis* :
distribution and persistence of
specific host immunoglobulins in
cyst membranes.**

Z. A. Khan & R. Siboo

Department of Microbiology & Immunol-
ogy, McGill University, 3775 University
Street, Montreal, Quebec, Canada.

Experimental Parasitology, 51, 159 (Apr. 81)

R81I131. Effect of a folate-binding protein on the plasma transport and tissue distribution of folic acid.

, Rubinoff, R. Abramson, C. Schreiber
S. Waxman*

Department of Medical Oncology, Mount
Sinai School of Medicine, 100 Street at
Fifth Avenue, New York, N.Y. 10029,
USA.

Acta Haematologica, **65**, 145 (No. 3, 1981)

R81I132. Effect of temperature upon relative viscosity of normal and myeloma serum.

, C. Leonard

Department of Medicine, The Royal
Victoria Infirmary, Newcastle upon-Tyne
NE14P, UK.

British J. of Haematology, **47**, 161 (Jan. 81)

R81I133. Effect of various doses of acetylsalicylic acid in combination with dipyridamole on the balance between prostacyclin and thromboxane in human serum.

L. Vünikka & O. Ylikorkala

Department of Clinical Chemistry &
Obstetrics & Gynaecology, University of
Oulu, Oulu, Finland.

British J. of Pharmacology, **72**, 299 (Feb 81)

R81I134. The effects of temperature and transmembrane potentials on the rates of electron transfer between membrane bound biological redox components.

A. M. Kuznetsou & J. Ulstrup

Institute of Electrochemistry, Academy of
Sciences of the USSR Leninskij prospect
31, 31 Moscow V. 71, USSR.

Biochimica and Biophysica Acta, **636**, 50
(12 June 81)

R81I135. Effects of vasopressin on smooth muscle cells of guinea pig mesenteric vessels.

T. Karashima

Department of Pharmacology, Faculty of
Medicine, Kyushu University, Fukuoka
812, Japan.

British J. of Pharmacology, **72**, 673 (Apr. 81)

R81I136. Evidence for covalent binding of adriamycin to rat liver microsomal proteins.

P. Ghezzi, M. G. Donelli, C. Pantarotto*,
T. Facchinetti & S. Garattini

Istituto di Ricerche Farmacologiche
"Mario Negri" via Erilrea 62, 20157-
Milan, Italy.

Biochemical Pharmacology, **30**, 175 (15
Jan. 81)

R81I137. Exploratory and socio-sexual behaviour in the male laboratory rat : a methodological approach for the investigation of drug action.

B. J. Meyerson & A. U. Hoglund

Department of Medical Pharmacology,
University of Uppsala, Box 573, S-75123
Uppsala, Sweden.

Acta Pharmacologica, et Toxicologica, **48**, 108
(Feb. 81)

R81I138. Functional properties of acetylcholine receptor monomeric and dimeric forms in reconstituted membranes.

W. C. S. Wu, & M. A. Raftery

Department of Pharmacology, Yale University School of Medicine, New Haven Connecticut 06510, U.S.A.

Biochemical and Biophysical Research Communication, **99**, 436 (31 Mar. 81)

R81I139. Glutamate-preferring receptors regulate the release of D-(3H) aspartate from rat hippocampal slices.

G. J. McBean & P. J. Roberts*

Department of Physiology and Pharmacology, School of Biochemical and Physiological Sciences, University of Southampton, Southampton, SO 93TU, UK.

Nature, **291**, 593 (18 June 81)

R81I140. Growth of adult human cells in culture at clonal densities.

R. Yasin, D. Kundu & E. J. Thompson

Muscular Dystrophy Labs, Institute of Neurology, Queen Square, London, England.

Cell Differentiation, **10**, 131 (May 81)

R81I141. *Hymenolepis diminuta* : partial characterization of membrane-bound nucleotidase activities (AT Pase and 5'-nucleotidase) in the isolated brush border membrane.

P. W. Pappas

College of Biological Sciences, Department of Zoology, The Ohio State University, Columbus, Ohio 43210, U.S.A.

Experimental Parasitology, **51**, 209 (Apr. 81)

R81I142 Influence of different energy drains on the inter-relationship between the rate of respiration, protonmotive force and adenine nucleotide patterns in isolated mitochondria.

U. Kuster*, G. Letko, W. Kunz, J. Duszynsky, K. Bogucka & L. Wojtczak

Institut für Physiologische Chemie Medizinische Akademie Magdeburg Leipziger Str. 44, 3090 Magdeburg Democratic Republic of Germany.

Biochimica et Biophysica Acta, **636**, 32 (12 June 81)

R81I143. *In vitro* assay of erythropoietin in fetal mouse liver cultures. I. comparison of radioactive tracers and evidence of assay specificity.

N. C. Brandan, P. M. Cotes* & J. Espada

Division of Clinical Chemistry, Clinical Research Centre, Watford Road, Harrow Middlesex, HA1 3UJ, UK.

British J. of Haematology, **47**, 461 (Mar. 81)

R81I144. *In vitro* assay of erythropoietin in fetal mouse liver cultures. II. Effects of human transferrin bound iron and of serum on the stimulation of incorporation of 3 H-thymidine into DNA.

N. C. Brandan, P. M. Cotes* & J. Espada

Division of Clinical Chemistry, Clinical Research Centre, Watford Road, Harrow Middlesex, HA13 UJ, UK.

British J. of Haematology, **47**, 469 (Mar. 81)

R81I145. The involvement of the membrane oxidoreduction system in stimulating amino acid uptake in ehrlich ascites tumor cells.

S. I. Yamamoto & T. Kawasaki*

Department of Biochemistry, Hiroshima University School of Medicine, Hiroshima 734, Japan

Biochimica et Biophysica Acta, **644**, 192 (22 June 81)

R81I146. Monoclonal antibodies against human fibroblast interferon.

H. K. Hochkeppel, U. Menge & J. Collins

Gesellschaft für Biotechnologische Forschung mbH, Mascheroder Weg 1, D-3300 Braunschweig, Federal Republic of Germany.

Nature, **291**, 500 (11 June 81)

R81I147. Osmotic fragility and fluidity of erythrocyte membrane from rats raised on an essential fatty acid deficient diet. A spin label study.

M. Ehrstrom, M. H. Ringdahl & C. Alling

Department of Biophysics, Arrhenius Laboratory, University of Stockholm, S-10691 Stockholm, Sweden.

Biochimica et Biophysica Acta, **644**, 175 (22 June 81)

R81I148. Pharmacological study of new indole derivatives and its biochemical correlates.

M. Sharma, V. Gujrati, G. Nath, G. P. Gupta, K. P. Bhargava & K. Shanker

Department of Pharmacology & Therapeutics, King George's Medical College, Lucknow 226003.

Pharmacological Research Communications, **13**, 461 (May 81)

R81I149. Phosphorylation of glycogen synthase I from human polymorphonuclear leukocytes.

H. Juhl

Department of Medicine, Marselisborg Hospital, DK-8000 Arhus C. Denmark.

Molecular, and Cellular Biochemistry, **35**, 77 (13 Mar. 81)

R81I150. Reaction of isoniazid with cellular constituents *in vitro*.

G. B. Maru, V. Bhede

Carcinogenesis Division, Cancer Research Institute, Tata Memorial Centre, Parel, Bombay 400012.

Indian J. of Cancer, **18**, 7 (Mar. 81)

R81I151. Reactivity of sulphhydryl group of cytosolic and mitochondrial bovine aspartate aminotransferases.

P. Petrilli, P. Pucci, A. M. Garzillo, G. Sannia & G. Marino†

Molecular and Cellular Biochemistry, **35**, 121 (13 Mar. 81)

†Address not available.

R81I152. A study of the applicability of QSAR calculation for peptide hormones.

L. Nadasdi & K. Medzihradszky

Institute of Organic Chemistry, Eotvos Lorand University, Budapest, Muzeum Krt 4/B, 1088 Hungary.

Biochemical and Biophysical Research Communications, **99**, 451 (31 Mar. 81)

R81I153. The uptake *in vitro* of monosaccharide, disaccharide and nucleic acid precursors by adult *Dirofilaria immitis*.

S. N. Chen & R. E. Howells

Department of Parasitology, Liverpool School of Tropical Medicine, Pembroke Place, Liverpool L35QA, UK.

Annals of Tropical Medicine & Parasitology, **75**, 329 (June 81).

J MOLECULAR BIOLOGY

R81J182. Activity of substance P analogs substituted at the gly⁹ and glu⁶ positions.

S. Blumberg & Vivian I. Teichberg

Departments of Biophysics and Neurobiology, The Weizmann Institute of Science, Rehovot, Israel.

Biochemical and Biophysical Research Communication, **99**, 752 (31 Mar. 81)

R81J183. Ampicillin resistance in *Neisseria denitrificans*: studies on ampicillin sensitive enzymes.

C. R. Mackenzie, I. J. McDonald & K. G. Johnson

Division of Biological Sciences, National Research Council of Canada, Ottawa, Ont, Canada K1A 0R6.

Canadian J. of Microbiology, **27**, 553 (May 81)

R81J184. Contact site cross linking agents.

G. R. Kunkel, M. Mehrabian & H. C. Martinson

Division of Biochemistry, Department of Chemistry, & the Molecular Biology Institute, University of California, Los Angeles, CA 90024, USA.

Molecular & Cellular Biochemistry, **34**, 3(2 Jan. 81)

R81J185. Correlation of mobilities of mutant hemoglobins in citrate agarose electrophoresis with specific molecular locations of affected residues.

R. C. Barwick & R. G. Schneider

University of Texas Medical Branch, Department of Pediatrics Galveston, TX 77550, USA.

Biochimica et Biophysica Acta, **660**, 485 (2 May 81)

R81J186. Diethylstilbestrol induces neoplastic transformation without measurable gene mutation at two loci.

C. Barrett, A. Wong & J. A. McLachlan

Environmental Carcinogenesis Group, Laboratory of Pulmonary function and Toxicology, National Institute of Environmental Health Science, NIH Research Triangle Park, North Carolina 27709, USA.

Science, **212**, 1402 (19 June 81)

R81J187. DNA-dependent RNA polymerase II of plant origin transcribes viroid RNA into full-length copies.

H. R. Rackwitz, W. Rohde & H. L. Sanger

Max-Planck Institut für Biochemie, D-8033 Martinsried bei München, Federal Republic of Germany.

Nature, **291**, 297 (28 May 81)

R81J188. Enhancement of 5-fluorouracil incorporation into human lymphoblast ribonucleic acid.

D. W. Kufe, & E. M. Egan

Division of Pharmacology and Medical Oncology, Sidney Farber Cancer Institute, Boston, MA 02115, USA.

Biochemical Pharmacology, **30**, 129 (15 Jan. 81)

R81J189. Freeze fracture electron microscopical investigation of *Candida albicans* cells sensitive and resistant to mystatin.

M. Pesti, E. K. Novak, L. Ferenczy & A. Svoboda

Department of Microbiology, Attila Jozsef University H-6701 Szeged, PO Box 428, Hungary.

Sobouraudia, **19**, 17 (Mar. 81)

R81J190. The genetic and physical basis of variability in *Escherichia coli* strains carrying a reference λ N group plasmid.

M. K. Kozłowska & V. N. Iyer

Department of Biology, Carleton University, Ottawa, Ont Canada K1S5B6.

Canadian J. of Microbiology, **27**, 616 (June 81)

R81J191. Inhibition of aminoacylation of formylmethionine tRNA of *E. coli* by deoxyribooligonucleotides complementary to the anticodon loop.

K. Jayaraman, D. N. Deobagkar & T. M. Jacob

Division of Biophysics, School of Hygiene & Public Health, The Johns Hopkins University, 615 North Wolfe Street, Baltimore MD 21205, USA.

Indian J. of Biochemistry & Biophysics, **18**, 7 (Feb. 81)

R81J192. Multiple forms of deoxyribonuclease.

Ta Hsiu Liao

Department of Biochemistry, Oklahoma State University, Stillwater OK 74078, USA.

Molecular and Cellular Biochemistry, **34**, 15 (20 Jan. 81)

R81J193. Only one of two closely related yeast suppressor tRNA genes contains an intervening sequence.

M. V. Olson, G. S. Page, A. Sentenac, P. W. Piper, M. Worthington, R. B. Weiss & B. D. Hall

Department of Genetics, Box 8031, Washington University, School of Medicine, St. Louis, Missouri 63110, USA.

Nature, **291**, 464 (11 June 81)

R81J194. Primary structure, gene organization and polypeptide expression of poliovirus RNA.

N. Kitamura, B. L. Semler, P. G. Rothberg, G. R. Larsen, C. J. Adler, A. J. Dorner, E. A. Emini, R. Hanecak J. J. Lee, S. Vander Werf, C. W. Anderson & E. Wimmer*

Department of Microbiology, School of Medicine, State University of New York at Stony Brook, NY 11794, USA.

Nature, **291**, 547 (18 June 81)

R81J195. Studies on the association of the α & β subunits of the tryptophan synthase of *Bacillus subtilis*.

S. O. Hoch & K. Saldau

Department of Cellular Biology, Scripps Clinic and Research Foundation, La Jolla CA 92037, USA.

Canadian J. of Microbiology, **27**, 604 (June 81)

R81J196. Synthesis of deoxyribonucleotides complementary to the anticodon loop of formylmethionine tRNA of *E. coli*.

K. Jayaramani & T. M. Jadab

Division of Biophysics, School of Hygiene & Public Health, The Johns Hopkins University, 615 North Wolfe Street, Baltimore, MD 21205, USA.

Indian J. of Biochemistry & Biophysics, **1** (Feb. 81)

R81J197. Synthesis of hepatitis surface and core antigens in *E. coli*.

J. C. Edman, R. A. Hallewell*, P. Valenzuela, H. M. Goodman & W. J. Rutter

Department of Biochemistry and Biophysics, University of California, San Francisco, California 94143, USA.

Nature, **291**, 503 (11 June 81)

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P. A. Ponte, M. Siekevitz, R. C. Schwarze, M. L. Gefter & G. E. Sonenshein

Department of Biochemistry, Boston University School of Medicine, Boston, Massachusetts 02118, USA.

Nature, **291**, 594 (18 June 81)

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M. Borgers, H. B. Levine & J. M. Cobb

Laboratory of Cell Biology, Janssen Pharmaceutical Research Laboratories, B234 Beerse, Belgium.

Sabouraudia, **19**, 27 (Mar. 81)

R81K171. Acidified glycerol lysis test.

L. Gottfried

Laboratory of Clinical Hematology,
Department of Pathology and Medicine,

The New York Hospital Cornell Medical
Center, 525 East, 68th Street, N. Y. 10021,
USA.

British J. of Haematology, **47**, 323 (Feb. 81)

R81K172. Drug consumption and age in a department of internal medicine.

K. Nielsen, A. W. Osterlind, L. V.
Christiansen, T. Anderson*, J. Hess, J. P.
Kampmann & J. E. Molholm Hansen

Hasanhaven 24, DK-2820, Gentofte,
Denmark.

Danish Medical Bulletin, **28**, 71 (Apr. 81)

R81K173. Drug interactions with phenytoin.

E. Perucca & A. Richens

Clinical Pharmacology Unit, Institute of
Neurology, National Hospital, Queen
Square, London WC1 3BG, England.

Drugs, **21**, 120 (Feb. 81)

R81K174. Electron spin resonance in haematological research.

M. A. Foster

Department of Biomedical Physics &
Bioengineering, University of Aberdeen,
Foresterhill, Aberdeen AB92ZD, UK.

British J. of Haematology, **47**, 1 (Jan. 81)

R81K175. Evaluation of tablets and granulations prepared by coating pan (bowl) and wet granulation method.

M. R. Baichwal & A. G. Seshadrinathan

Department of Chemical Technology,
University of Bombay, Bombay 400 019.

Indian J. of Pharmaceutical Sciences, **43**, 29
(Mar. & Apr. 81)

R81K176. Evaluation of two methods for the detection of the enzyme peni- cillinase.

R. Bhatia, A. Varghese & D. S. Agarwal*

Department of Microbiology, Maulana
Azad Medical College, New Delhi-116002.

Indian J. Medical Research, **73**, 729 (May 81)

R81K177. Further evaluation of in- direct immunofluorescence methods for detection of antibodies against *Aspergillus fumigatus*.

D. W. Warnock & B. M. Hann

Department of Microbiology, Bristol Royal
Infirmary, Bristol BS 28 HW, UK.

Sabouraudia, **19**, 49 (Mar. 81)

R81K178. A history of British pharmacognosy pt. 3 The unfortunate phoenix, 1950-1980.

E. J. Shellard

Pharmacognosy University of London

Pharmaceutical, J. **226**, 406 (18 Apr. 81)

R81K179. Identification of some neutral lipids of *Thiobacillus thioparus* using gas chromatography-chemical Ionization mass spectrometry.

R. K. Christopher, A. M. Duffield & B. J. Ralph

Biological Mass Spectrometry Unit, University of New South Wales, PO Box 1, Kensington, NSW 2033.

Australian J. of Biological Sciences, **33**, 737 (Dec. 80)

R81K180. *In vitro* availability of commercial phenytoin tablets and capsules.

A. R. Baichwal & H. P. Tipnis

School of Pharmacy, St. John's University, Jamaica, New York 11439, USA.

Indian J. of Pharmaceutical Sciences, **43**, 33 (Mar.-Apr. 81)

R81K181. Liquid chromatographic method to measure thioridazine and its active metabolites in plasma.

T. Skinner, R. Gochnauer & M. Linnoila

Department of Psychiatry, Duke University Medical Center, Durham, NC 2770, USA.

Acta Pharmacologica et Toxicologica, **48**, 223 (Mar. 81)

R81K182. New approach to heterogeneous enzyme immunoassays using tagged enzyme ligand conjugates.

T. T. Ngo & H. M. Lenhoff

Department of Developmental and Biology, University of California Irvine, CA, 92717, USA.

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John G. R. Hurrell, Paul M. Malouf & R. Conway

Research and Development Division, Commonwealth Serum Laboratories, Poplar Rd, Parkville, Vic 3052.

Australian J. of Biological Sciences, **33**, 6 (Dec. 80)

R81K184. Photosensitization in organic synthesis.

A. Albini

Istituto di Chimica Organica dell' Università, Viale Taramelli 10. I-27100 Pavia, Italy.

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R81K185. A physiological solvent for crystalline insulin.

W. D. Loughheed, U. Fischer, K. Perlman & A. M. Albisser*

The Hospital for Sick Children, 555 University Avenue Toronto, Ontario, M5G 1X8, Canada.

Diabetologia, **20**, 51 (Jan. 81)

K186. Production of protoplasts from different yeasts by mutanase.

A. Stephen & A. Nasim

Molecular Genetics Section, Division of Biological Sciences, National Research Council of Canada, Ottawa, Ont, Canada K1A0R6.

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C. Walker, L. C. Woodson & R. M. Winslow*

Clinical Pharmacology Unit, Department of Internal Medicine and Pharmacology, Mayo Foundation/Mayo Medical School, Rochester, MN 55901, USA.

Chemical Pharmacology, **30**, 115 (15 Jan. 1981)

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T. Chorna & H. Yamazaki*

Department of Biology & Institute of Biochemistry, Carleton University, Ottawa, Ont, Canada K1S5B6.

Canadian J. of Microbiology, **27**, 547 (May 1981)

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K. Anbalagan & T. Somasundaram

Department of Biochemistry, School of Biological Sciences, Madurai Kamaraj University, Madurai 625021, India.

Indian J. of Biochemistry & Biophysics, **18**, 80 (Feb. 81)

R81K190. Synthesis of ansamycins: an approach to the naphthoquinone portion of the rifamycins and streptovaricins.

K. A. Parker & J. J. Petratis

Department of Chemistry, Brown University Providence, Rhode Island 02912, USA.

Tetrahedron Letters, **22**, 397 (No. 5, 1981)

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A. Szabo

Department of Analytical Chemistry, Institute for Drug Research, P. O. B. 82, 1325 Budapest, Hungary.

The Analyst, **106**, 602 (May 81)

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J. D. Phillipson, A. I. Gray, A. A. R. Askari & A. A. Khalil

Department of Pharmacognosy, The School of Pharmacy University of London 29-39, Brunswick Square, London WC1N1AX, U. K.

J. Natural Products (LLoydia), **44**, 296 (May-June 81)

R81L139. Alkaloids of *Cryptocarya longifolia*: X-ray crystal structure of thalifoline and longifolonine.

I. R. C. Bick, T. Sevenet, W. Sinchai, B. W. Skelton & A. H. White

Chemistry Department, University of Tasmania, P. O. Box 2526, Hobart Tas. 7001.

Australian J. of Chemistry, **34**, 195 (No. 1, 1981)

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M. D. Menachery & M. P. Cava*

Department of Chemistry, University of Pennsylvania, Pennsylvania 19104.

J. Natural Products (LLoydia), **44**, 320 (May-June 81)

R81L141. Alkaloid variation in *Lupinus holosericeus*.

W. J. Keller

School of Pharmacy, Northeast Louisiana University, Monroe, Louisiana 71209.

J. Natural Products (LLoydia), **44**, (May-June 81)

R81L142. Antibiotic principle of *Eupatorium capillefolium*.

K. V. Rao & F. M. Alvarez

Department of Medicinal Chemistry College of Pharmacy, Box J4-J. Hi Miller Health Center, University of Florida, Gainesville, FL32610.

J. of Natural Products (LLoydia), **44**, 2 (May-June 81)

R81L143. Application of mass spectrometry in structural problems in triterpenes.

L. Ogunkoya

Department of Chemistry, University of Ife Ile-Ife, Nigeria.

Phytochemistry, **20**, 121 (No. 1, 1981)

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A. El-Sayed & Deoffrey A. Cordell

Department of Pharmacognosy Pharmacology, College of Pharmacy University of Illinois at the Medical Center, Chicago, Illinois 60612, USA.

J. Natural Products (LLoydia), **44**, 2 (May-June 81)

R81L145. Catharanthus alkaloids, XIV isolation of vincleukoblastine (LB) and periformyline from Catharanthus trichophyllus and pericyclivine from Catharanthus roseus.

Mukhopadhyay & G. A. Cordell

Department of Pharmacognosy & Pharmacology College of Pharmacy University of Illinois at the Medical Center, Chicago, Illinois 60612.

Natural Products (Lloydia), **44**, 335 (May-June 81)

R81L146. Chemical composition and biological activity of the tanzanian plant Ocimum suave.

B. Chogo & G. Chank

Department of Applied Organic Chemistry, University of New South Wales, P. O. Box 1, Kensington New South Wales, Australia 2033.

Natural Products (Lloydia), **44**, 308 (May-June 81)

R81L147. High-performance liquid chromatography infrared & raman spectra of steroidal sapogenins.

R. Hunter, M. K. Walden, G. F. Bailey & E. Heftmann

Plant Physiology & Chemistry Research University, U. S. Department of Agriculture, Berkeley, California 94710 U. S. A.

J. Natural Products (Lloydia), **44**, 245 (May-June 81)

R81L148. An intramolecular passerini reaction synthesis of hydrastine.

J. R. Falck & S. Manna

Department of Molecular Genetics, University of Texas Health Science Center at Dallas, Dallas, Texas 75235, USA.

Tetrahedron Letters, **22**, 619 (No. 7, 1981)

R81L149. Iridoid mono- and diglycosides in Mentzelia.

S. R. Jensen, C. B. Mikkessen & B. J. Nielsen

Department of Organic Chemistry, The Technical University of Denmark, 2800 Lyngby, Denmark.

Phytochemistry, **20**, 71 (No. 1, 1981)

R81L150. Isobenzofulvenes VII. Regio- and site-selective cycloadditions and their potential in anthraquinone synthesis.

R. A. Russell, E. G. Vikingur & R. N. Warren

Department of Chemistry, Faculty of Military Studies, University of New South Wales, Duntroon, ACT 2600.

Australian J. of Chemistry, **34**, 131 (No. 1, 1981)

R81L151. The isolation and identification of several trichothecene mycotoxins from Fusarium heterosporum.

R. J. Cole, J. W. Dorner, R. H. Cox B, M. Cunfer, H. G. Cutler & B. P. Stuart

National Peanut Research Laboratory, USDA, SEA, AR, SR, P. O. Box 637, Dawson, Georgia 31742

J. Natural Products (Lloydia), **44**, 324 (May-June 81)

R81L152. Limonoids of calamondin seeds.

R. D. Bennett & S. Hasegawa

Fruit and Vegetable Chemistry Laboratory
Science & Education Administration
US. Department Agriculture, Pasadena
CA 91106, U. S. A.

Tetrahedron, **37**, 17 (No. 1, 1981)**R81L153. Melfusin, a new germacrolide from *Melampodium diffusum*.**

L. Quligano & N. H. Fischer

Instituto de Quimica, UNAM, Mexico
City, Mexico.

J. Natural Products (Lloydia), **44**, 266 (May-June 81)**R81L154. Membrane permeability changes a component of phytochrome-mediated anthocyanin synthesis in *Sinapis alba*.**

G. C. Whiteham & C. B. Johnson

Department of Botany, Plant-Science
Laboratories, University of Reading, RG
62 AS, Berkshire, U. K.

Phytochemistry, **20**, 9 (No. 1, 1981)**R81L155. New alkaloids from *Berberis orthobotrys*.**

S. F. Hussain, L. Khan, K. K. Sadozai & M. Sharma

PCSIR Laboratories, Peshawar, Pakistan,

J. Natural Products (Lloydia), **44**, 274 (May-June 81)**R81L156. New metabolites from the brown algal genus *Cystophora*.**R. Kazlauskas, K. King, P. T. Murphy
R. G. Warren & R. J. Wells

Roche Research Institute of Marine
Pharmacology, P. O. Box 255 Dec. W.
N. S. W. 2009.

Australian J. of Chemistry, **34**, 439 (No. 1981)**R81L157. Nouvelle voie d'Acces aux C-Glycosides.**

S. Czernecki et F. Gruy

Laboratoire de Genetique et Mechanisme
de Reactions Organiques, CNRS LR
associee a L' Universite Pierre et Marie
Curie, Paris VI; 4 Place Jussieu, 752
Paris, Cedex 05.

Tetrahedron Letters, **22**, 437 (No. 5, 1981)**R81L158. ¹³C nuclear magnetic resonance spectra of 23 hydroxy spirostane sapogenins of *Solanum hispidum*.**

A. K. Chakravarti, S. C. Pakrasi & M. Uzawa

Indian Institute of Experimental Medicine,
Culcutta-700032.

Canadian J. of Chemistry, **59**, 1328 (1 May 81)**R81L159. Flavonoids of *Haplopappus reingfoanus* remedy in gay**A. Ulubelen, W. D. Clark, G. K. Brown
& T. J. Mabry

Faculty of Pharmacy, University
Istanbul, Istanbul, Turkey.

J. Natural Products (Lloydia), **44**, 274 (May-June 81)

R81L160. Sipholenol and sipholenone, two new triterpens from the marine sponge *Siphonochalina siphonella*. (LEVI)

Shmueli, S. Carmely, A. Groweiss & Kashman

Department of Chemistry, Tel-Aviv University, Tel Aviv 69978, Israel.

Tetrahedron Letters, **22**, 709 (No. 7, 81)

R81L161. Some pharmacological actions of the extract of *morus indica* tree roots.

K. Barman, G. K. Chatterjee, A. K. Bag Chaudhuri & S. P. Pal

Division of Pharmacology Department of Pharmacy, Jadavpur University, Calcutta-700032.

Indian J. of Pharmacology, **12**, 237 (Oct.-Dec. 80)

R81L162. Soularubinone, A new antileukemic quassinoid from *Soulamea mentosa*.

M. V. Tri & J. Polonsky*, C. Merienne, T. Sevenet

Institute de Chimie des Substances Naturelles, C. N. R. S. 91190 Gif-sur-Yvette, France.

J. Natural Products (Lloydia), **44**, 279 (May-June 81)

R81L163. A synthesis of (d. 1) acoradiene III.

J. Ficini, G. Revial & J. P. Genet

Laboratoires de Chimie. Organique de synthese Equipe de Recherche Associee au C. N. R. S. Universite Pierre et Marie Curie, 8, rue Curvier-75005, Paris.

Tetrahedron Letters, **22**, 6133 (No. 7, 1981)

R81L164. A synthetic route to thoinolactones'

M. K. Kaloustian & F. Khouri

Department of Chemistry, Fordham University, Bronx, N. Y. 10458, USA.

Tetrahedron Letters, **22**, 413 (No. 5, 1981)

M GENERAL

R81M102. Angiogenesis inhibitors link many diseases.

T. H. Maugh II*

Address not available.

Science, **212**, 1374 (19 June 81)

R81M103. Biomedical research in the 1980s.

D. S. Fredreckson

Dr. Fredreckson at Bldg. 1 Rm 124, National Institute of Health, Bethesda, MD 20205, USA.

New England J. of Medicine, **304**, 509 (26 Feb. 81)

R81M104. Current attempts to prevent the use of animals in medical research.

M. B. Visscher

Department of Physiology, University of Minnesota Medical School, 6-255 Millard Hall, 435 Delaware St. SE, Minneapolis, MN 55455, USA.

J. of the American Medical Association, **245**, 1223 (27 Mar. 81)

R81M105. Editorial policy.

W. R. Barclay†

J. of the American Medical Association, **245**, 1251 (27 Mar. 81)

R81M106. How safe does a drug have to be?

Editorial

Lancet, **1**, 1297 (13 June 81)

R81M107. Implications for health care policy: A social and demographic profile of Hemodialysis Patients in the United States.

R. W. Evans, C. R. Blagg & F. A. Bryan

Health and Population Study Centre
Battelle Human Affairs Research Centre
4000 NE 41st P. O. Box 5395 Seattle, WA
98105, USA.

J. of American Medical Association, **245**, 4
(6 Feb. 81)

R81M108. The mechanisation of mankind.

Peter Marsh

New Scientist, Commonwealth House
1-19 New Oxford Street, London WC1
1NG, UK.

New Scientist, **89**, 418 (12 Feb. 81)

R81M109. Medical Science and Technology.

S. Vaisrub*

Address not available.

J. of the American Medical Association, **245**,
499 (6 Feb. 81)

R81M110. Overseas doctors: coming to Britain.

R. Smith

British Medical Journal London, WC1
9JR, UK.

British Medical Journal, **282**, 1045 (28 Mar. 81)

R81M111. Pioneers of science.

Editorial.

Endeavour, **5**, 1 (No. 1, 1981)

†Address not available.

NEW TECHNIQUES

N045. Improved detail in Biological soft X-ray microscopy: study of blood platelets.

Feder, J. L. Costa, P. Chaudhari & D. ...

M Watson Research Center, Yorktown Heights, New York, 10598, USA.

Science, **212**, 1398 (19 June 81)

R81N046. A new test to study diabetic autonomic neuropathy.

W. Wieling, J. F. M. Van Brederode & C. Borst

Department of Internal Medicine Binnen-gasthuis, Academic Hospital Grimborgwal 10, 1012 GA, Amsterdam, The Netherlands.

Diabetologia, **20**, 244 (Mar. 81)

NEW REACTIONS

R81P163. A novel reducing agent derived from formic acid and two equivalents of a grignard reagent: chemoselective reduction of aldehydes.

H. Babler, & B. J. Invergo

Department of Chemistry, Loyola University of Chicago, Chicago, Illinois 60626, USA.

Tetrahedron Letters, **22**, 621 (No. 7, 1981)

R81P164. Simple novel preparation of unsymmetrical triacetylenes.

M. Ladika & P. J. Stang*

Chemistry Department, The University of Utah Salt Lake City, Utah 84112, USA.

J. C. S. Chemical Communications, No. 10, 459 (1981)

R APPLIED MICROBIOLOGY

R81R032. Fermentor exhaust air for industrial waste water treatment.

P. J. Kathari, A. N. Shah & O. H. Patil

Department of Civil Engineering, Faculty of Technology & Engineering, Baroda.

Indian J. of Environmental Health, **23**, 60 (Jan. 81)

R81R033. Microbiological transformations 2. Hydroxylation of non activated carbons in globular type amides.

R. Furstoss, A. Archelas, B. Waegell, J. L. Petit & L. Deveze

Laboratoire de Stereochimie, LA 109 et Laboratoire de L'Ecole Supérieure de Chimie de Marseille.

Tetrahedron Letters, **22**, 445 (No. 5, 1981)

R81R034. Monocyclic β -lactam antibiotics produced by bacteria.

R. B. Sykes, C. M. Cimarusti, D. P. Bonner, K. Bush, D. M. Floyd, N. H. Georgopapadakou, W. H. Koster, W. C. Liu, W. L. Parker, P. A. Principe, M. L. Rathnum, W. A. Slusarchyk, W. H. Trejo & J. S. Wells

The Squibb, Institute for Medical research, P. O. Box 4000, Princeton, Jersey 08540, USA.

Nature, **291**, 489 (11 June 81)

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1. SENIOR TECHNICAL ASSISTANT

: One post

(Rs. 550-25-750-EB-30-900)

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Job requirements: For processing of microfilm/microfiche of documents in the Reprography Laboratory of the Centre.

2. SENIOR LIBRARIAN

: One post

(Rs. 550-25-750-EB-30-900)

Graduate, preferably in Science with a degree in Library Science and at least 7 years professional experience in a large Library of a scientific or industrial organisation. Good knowledge and practical experience of technical processing of books, reports, periodicals and other documents in a specialised Library are essential.

Job requirements: For taking up the increased load of work of acquisition and processing of documents and the Centre.

3. SENIOR REPROGRAPHIC ASSISTANT

: One post

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Diploma in Printing Technology. Five year's experience in the operation and maintenance of Offset printing machines with high degree of competence in five quality half-tone printing. Handling of process camera in making line and half-tone negatives will be an added qualification.

Job requirements: To carry out the work of the Information Centre.

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(Rs. 425-15-500-EB-15-560-20-700)

Graduate in Science/Economics with 5 years experience in budgeting and accounting of or/and procurement of Scientific equipments from within India and abroad for and/or maintenance of establishment records of personnel in a scientific research institution.

Job requirements: For assisting in the work of project monitoring, budgeting accounting, procurement of scientific equipment, maintenance of establishment records of personnel etc. of the Centre and allied work.

(Candidates who had applied for this post earlier need not send the postal order for Rs. 8/- alongwith their applications but they must make a remark to that effect in the application against the space provided for the purpose).

The posts carry usual allowances admissible under the Central Government rules. Qualifications/experience are relaxable in case of candidates otherwise well qualified/experience and found suitable for the post. Application for the post mentioned above on the prescribed form obtainable from the office of the Administrative Officer, Central Drug Research Institute, Chattar Manzil Palace, Lucknow-226001, should reach him not later than **20.11.81**. The application must be submitted with an application fee of Rs. 8/- (Rs. 2/- for Scheduled Castes/Tribes candidates) in the form of crossed Indian Postal Order.

The application form will be supplied on request accompanied by a self-addressed stamped envelop of size 23 × 10 cms. indicating thereon the name of the post for which the form is required.

Candidates already in service must apply through proper channel. Advance copies of application will be not entertained.

Canvassing in any form and/or bringing in any influence political or otherwise, will be treated as a disqualification.

INTERIM INQUIRIES WILL NOT BE ATTENDED TO

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1. **REFRIGERATION MECHANIC** : One post
(Rs. 380-12-500-EB-15-560)

Matric or equivalent, I-T.I. Certificate in refrigeration trade. At least 5 year's experience as a Refrigeration & airconditioning mechanic in a reputed organisation. Ability to handle various types of reciprocating compressors and knowledge of electric and gas welding will be added qualifications. *Job requirements:* To maintain and repair the air-conditioning system of the Library.

2. **JUNIOR LIBRARIAN** : One post
(Rs. 330-10-380-EB-12-500-EB-15-560)

I.Sc. with a certificate in Library Science (B.L.Sc. will be preferred with at least 3 years experience in routine Library activities in a Science Library. *Job requirements:* To man the Library Counter and to assist in the acquisition, verification and maintenance of books and card catalogue and in other routine Library work.

3. **CATALOGUER 'A'** : One post
(Rs. 330-10-380-EB-12-500-EB-15-560)

I.Sc. with a certificate in Library Science (B.L.Sc. will be preferred) with at least three years experience in cataloguing in science Library. *Job requirements:* Cataloguing of scientific and technical publications.

Application may be submitted on a plain paper stating Date of birth, Postal address, qualifications, and experience with attested copies of testimonials which should reach the Administrative Officer, Central Drug Research Institute, Chattar Manzil Palace, Lucknow-226001, not later than **20.11.81**.

Candidates already in service must apply through proper channel. Advanced copies of application will not be entertained.

INTERIM INQUIRIES WILL NOT BE ATTENDED TO

ENDOCRINE SYSTEM

R81A251. Abnormal function of the corpus luteum in some ewes with hyto-oestrogenic infertility.

R. Adams, H. Hearnshaw & C. M. Dedham

Division of Animal Health, CSIRO, Private Bag, P. O. Wembley, W. A. 6014, Australia.

Australian J. of Biological Sciences, **34**, 61 (No. 1, 1981)

R81A252. Absence of luteinizing hormone releasing and antifertility properties in a glucagon selective somatostatin analogue.

F. J. Bex, A. Corbin, D. Sarantakis & E. Lien

Sections of Endocrinology, Wyeth, Laboratories, Inc, Box 8299, Philadelphia, Pennsylvania 19101, U.S.A.

Nature, **291**, 672 (25 Jun., 1981)

R81A253. Cellular localization of the Mn^{2+} -dependent adenylyl cyclase (AC) in rat testis.

J. O. Gørdeladze*, K. Purvis, O. P. F. Clausen, F. F. G. Rommerts & V. Hansson

Institute of Pathology, Rikshospitalet, Oslo, 1. Norway.

International J. of Andrology, **4**, 172 (Apr. 1981)

R81A254. Central epienergetic inhibition of corticosterone release in rat.

K. A. Roth*, R. J. Katz, M. Sibel, I. N. Mefford, J. D. Barchas, & B. J. Carroll

Nancy Pritzker Laboratory of Behavioral Neurochemistry, Department of Psychiatry and Behavioral Sciences, Stanford, University School of Medicine, Stanford California 94305, USA.

Life Sciences, **28**, 2389 (25 May, 1981)

R81A255. Central of estrogen synthesis in the testis of the infant rat by FSH and androgen.

D. K. Pomerantz

MRC Group in Reproduction Biology, The University of Western Ontario, London, N6A 5C1, Canada.

Molecular and Cellular Endocrinology, **22**, 339 (Jun., 1981)

R81A256. Changes in the concentration of gonadotrophic and steroidal hormones in the antnal fluid of ovarian follicles throughout the oestrous cycle of the sheep.

K. P. Mc Natty, M. Gibbs, C. Dobson, D. C. Thurley & J. K. Findlay

Department of Obstetrics & Gynecology, University Hospital Rijnsburgerweg 10, Leiden, The Netherlands.

Australian J. of Biological Sciences, **34**, 67 (No. 1, 1981)

R81A257. Cytosolic androgen receptor in skeletal muscle from normal & testicular feminization mutant (Tfm) rats.

S. R. Max

Department of Neurology, University of Maryland, School of Medicine, Baltimore, Maryland 21201, U.S.A.

Biochemical and Biophysical Research Communications, **101**, 792 (14 Aug., 1981)

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Cecil H. and Ida Green Centre for Reproductive Biology Sciences, The University of Texas South-Western Medical School, 5323 Harry Hines, Boulevard, Dallas, Texas-75235.

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D. J. Flint* & D. M. Ensor

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Department of Biochemistry, Hebrew University Hadassah Medical School and Hadassah University Hospital, Jerusalem, Israel.

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Department of Zoology, University of Hull, Hull HU6 7RX, U. K.

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Department of Biochemistry, University College of Science 35, Ballygunge Circular Road, Calcutta-700019.

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Laboratory of Experimental Endocrinology, Department of Experimental Morphology, University of Chile Medical School, Casilla 211 04, Correo 21, Santiago, Chile

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V. Schusdziarra*, G. Dangel, M. Klier, I. Henrichs, and E. F. Pfeiffer

Zentrum fur Annere Medizin der Universitat Ulm Medizinische Klinik der Stadt Ulm Steinhovelstrasse, 9, D-7900 (Donau) West Germany.

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Institute for Research in Reproduction (ICMR) Bombay-400012.

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Laboratoire de Biochimie, U. E. R. Biomedical des Saints Peres 45, rue des Saints Peres, 75270, Cedex 06, France.

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Department of Biochemistry, Faculty of Science, Mahidol University, Rama VI Road Bangkok (Thailand).

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International Institute of Cellular & Molecular Pathology, Avenue Hippocratic 75, B-1200 Brussels, Belgium.

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R. C. Goodlin

Department of Obstetrics and Gynecology, University of Nebraska Medical Centre, 42nd and Dewey Ave, Omaha, Nebraska 68105.

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Department of Physiological Chemistry and the Waisman Center on Mental Retardation and Human Development, The University of Wisconsin, Madison, Wisconsin. 53706, U.S.A.

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Worcester Foundation for Experimental Biology, Shrewsbury, Massachusetts 01545, U.S.A.

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Department of Physiology, University of Western Ontario, London, Ont. Canada N6A 5C1.

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Building 10, Room 9D-20, National
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Division of Perinatal Medicine, Department
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Histology & Histochemistry Laboratory,
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Department of Pharmacology, Dalhousie
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Viale Morgagni 85, 50134, Florence,
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Institute of Physiology & Institute of Pathophysiology, University Medical School, Pecs, Hungary.

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Division of Medicinal Chemistry, Central Drug Research Institute, Lucknow- 226001.

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Division of Medicinal Chemistry, Central Drug Research Institute, Lucknow-226001.

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M. Miyano

Department of Medicinal Chemistry, G. D. Searle & Co. Chicago, Illinois 60080, USA.

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M. M. Pugeat, J. F. Dunn, & B. C. Nisula*

Building 10, Room 10B-09, National Institute of Health, Bethesda, Maryland 20205.

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 Pathology Dept. of Royal Hospital for
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Nuffield Department of Anaesthetics and
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 Oxford, U. K.

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A. DeHollander, & C. Delcroix*

I. R. I. B. H. N., Faculte de Medicine,
 Rue Evers, 2, 1000 Brussels, Belgium.

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Department of Pharmacology & Thera-
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 Lucknow-226002.

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O. E. Rossler

Institute for Physical and Theoretical
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I. Yokoi, S. E. Rose & T. Yanagihara*

Department of Neurology, Mayo Clinic
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Department of Biochemistry, Miyazaki
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 16 Japan.

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M. Beausang-Linder & A. Bill

Department of Physiology & Medical Biophysics Biomedical Centre, University of Uppsala (Sweden).

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Institut für Pharmakologie und Toxikologie der Universität des Saarlands, D-6650 Homburg/Saar, Federal Republic of Germany.

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Pharmakologisches Institut der Universität Mainz, Obere Zahlbacher Strasse 67, D-6500 Mainz, Federal Republic of Germany.

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Biological Psychiatry Branch & Clinical Psychobiology Branch, National Institute of Mental Health, Bethesda, MD 20201 U.S.A.

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Department of Pharmacology, Victoria College of Pharmacy, 381 Royal Parade Parkville, Australia 3052.

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Department of Pharmacology K. G. Medical College, Lucknow-226003.

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University of Lyon, Lyon-Sud Medical School, Laboratory of Biochemistry INSERM U. 189 and ERA-CNRS 563 B P. 12 69600 OULLINS, France.

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Department of Pharmacology, Karolinska Institute, Stockholm, Sweden.

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J. S. D. Chan*, N. G. Seidah, M. Ikeda, J. Guthowska, R. Boucher, J. Genest & M. Chretien

The Mount Sinai Medical Centre, Department of Medicine, Division of Endocrinology, One Gustave L. Levy Place, New York USA-10029-

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Department of Physiology, University of Colorado Health Sciences Centre, Denver, Colorado-80262.

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J. Y. Summy-Long, K. M. Rosulla & L. C. Keil

Department of Pharmacology, The Pennsylvania State University College of Medicine, The Milton S. Hershey Medical Centre, Hershey, Pa 17033, U.S.A.

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E. W. D. Colt, S. L. Wardlaw & A. G. Frantz

Department of medicine, St. Luke's Roosevelt Hospital Center, U.S.A.

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The Lilly Research Laboratories, Eli Lilly and Company, Indianapolis, Indiana 46285, U.S.A.

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Institute of Pharmacology, University Medical School, H-7643 Pecs, Hungary.

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H. Summerschild

The Institute of Neurophysiology, University of Oslo, Norway.

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Department of Physiology, University of Colorado Health Center, Denver, Colorado-80262.

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A. Kreutzberger, H. Schimmelpfenning

Institut fur Pharmazie Johannes Gutenberg, Universitat Mainz Saarstra Be 2 6500-Mainz.

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F. S. Tepperman, M. Hirst & C. W. Gowdey

Department of Pharmacology, University of Western Ontario, London, Canada N6A 5 CI.

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J. J. Heindel, A. Steinberger & S. J. Strada

Department of Reproductive Medicine and Biology Department of Pharmacology University of Texas Medical School at Houston, Houston, TX 77025 U.S.A.

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L. Gustafsson

Department of Physiology, Karolinska Institute, 10401, Stockholm (Sweden).

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R. A. Hann & S. K. Farrell

Department of Cardiovascular Pharmacology, The Lilly Research Laboratories Eli-Lilly & Company Indianapolis, Indiana 46285.

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Institute of Drug Research, H-1325, Budapest, P. O. Box 82, Hungary.

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Brain Research Laboratory, E. Blocket and the Department of Neurology, University of Lund, Sweden.

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M. M. Al-Yassiri, S. I. Ankier & P. K. Bridges

Academic Unit for Clinical Pharmacology, Guy's Hospital Medical School, London Bridge, London, U. K.

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M. W. Adler

Department of Pharmacology, Temple University School of Medicine, Philadelphia Pa. 19140.

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W. R. Mortin

Department of Pharmacology, University of Kentucky, College of Medicine, Research Facility 2, MR-102 Lexington, Kentucky-40536.

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Department of Pharmacology, University of Kentucky, College of Medicine, Research Facility 2, MR-102 Lexington, Kentucky, 40536.

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A. Cowan

Department of Pharmacology, Temple University School of Medicine. Philadelphia, PA 19140. USA.

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P. K. Awasthi, K. N. Dhawan, M. Hasan, S. F. Ali & O. M. Chandra

Department of Pharmacology & Brain Research Centre, J. N. Medical College, Aligarh Muslim University, Aligarh-20201.

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M. T. Alderdice & R. L. Volle

Department of Pharmacology, Louisiana State University Medical Center, 154 Tulane Avenue, New Orleans, Louisiana

Archives of Pharmacology, **316**, 126 (Apr. 1981)

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Pharmindustrie Groupe PHARMUKA, 35, Quai du Moulin de Cagne, F-92230 Gennevilliers, France.

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T. J. Cunningham, I. M. Mohler & D. I. Giordano

Department of Anatomy, The Medical College of Pennsylvania, 3300 Haver Avenue, Philadelphia, Pa 19129, U.S.A.

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A. A. Shefner, R. A. North* and R. S. Zukin

Department of Nutrition and Science,
6-321. Massachusetts Institute of Tech-
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D. O. Walter & F. E. Yates

Brain Research Institute, University of
California at Los Angeles, U.S.A.

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P. M. Singh, G. C. Prasad* & K. N. Udupa

Surgical Research Laboratory & Depart-
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Sciences, Banaras Hindu University,
Varanasi-221005.

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R. E. Chipkin*, D. H. Morris, M. G.
English, J. D. Rosamend, C. H. Stammer,
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Department of Biochemistry, University
of Colorado, School of Medicine, Denver,
Colorado, 80262.

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V. S. Jally & V. Singhal (nec Bansal)

Research Section, Chemical Laboratories,
Maharaja College, Chhatarpur-471001.

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D. R. Theodore & J. Abraham*

Department of Neurosurgery, Christian
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K. K. Nagda,

Department of Biochemistry, Dr. V. M.
Medical College, Solapur-413003.

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N. Nimura, Y. Kasahara, T. Kinoshita

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Department of Oral Biology-Pharmacology, School of Dentistry and Medicine, Medical College of Georgia, Augusta, Georgia-30912.

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A. Grinvald, L. B. Cohn, S. Leshner, M. B. Boyle

Department of Physiology, Yale University School of Medicine, New Haven Connecticut-06510.

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G. Fried†

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R. W. Ledeen, J. E. Haley, & J. A. Skrivanek

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Medical Research Council Toxicology Unit, M. R. C. Laboratories, Woodmansterne Road, Carshalton, Surrey, SM4EF, U.K.

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S. D. Samant & R. A. Kulkarni

Department of Chemistry, Ramnarayan Ruia College, Matunga, Bombay-400 015

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†Address not available.

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Chemistry Department, Faculty of Science, Qatar University, Doha, P. O. Box 2713, Qatar.

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Rudolf-Buchheim-Institut für Pharmakologie der Justus-Liebig-Universität, Gießen, Frankfurter Strasse 107, 663000 Gießen, Federal Republic of Germany.

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J. M. White, & S. G. Holtzman*

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Department of Pharmacology, School of Medicine, Fukuoka University, Fukuoka 814-01, Japan.

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L. Vacek & P. Braveny

Laboratory of the Pathophysiology of Circulation, Faculty of Medicine, J. E. Purkyně University, Brno, USSR.

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M. C. MacDonald, R. L. Kline & C. J. Mogenson*

Department of Physiology, University of Western Ontario, London, Ont., Canada, N6A 5C1.

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Department of Physiology, University of Missouri, School of Medicine, Columbia, Missouri-65212.

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Laboratorio de Farmacologia, Faculdade de Medicina, 4200 Porto, Portugal.

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Regional Research Centre of the National Institute of Health (Kunz), Department of Pathological Physiology, Medical Faculty, J. E. Perkyne University, Brno.

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Department of Pharmacy, Jadavpur University Calcutta-700 032.

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F. Holt

Department of Chemistry, The Univer-
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Department of Physics, Jawaharlal Insti-
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Groupe de Recherche sur le Diabete et la
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3, 75010 Paris.

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Faculty of Medicine, Memorial Univer-
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S. Muthar, D. M. Potter & W. M.
Cennet*

Division of Nephrology, University of
Oregon Health Science Center; 3181
S. W. Sam Jackson Park Road, Portland,
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Chemisch-Wissenschaftliches Labor Pharma, Boyer AG, Postfach 101709 5600 Wuppertal.

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M. H. Aurousseau, J. L. d'Angeli & F. Jasso

Laboratoire d' Hematologie. CHU Necker-Enfants-Malades, 156, rue de Vaugirard, F-75015, Paris, France.

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S. I. Kobayashi, J. Sekino, K. Honda & K. Imai*

Department of Analytical Chemistry
Faculty of Pharmaceutical Sciences
University of Tokyo, Hongo 7-3
Bunkyo-ku, Tokyo 113, Japan.

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E. Van Obberghen & C. R. Kahn

I. N. S. E. R. M. U. 145, Faculté de Médecine, Chemin de Vallombrose, 06000 Nice, Cedex, France.

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J. J. Gagliardino

Centre de Endocrinologia Experimental by Applicada (CENEXA), UNLP-CO. CET, Facultad de Ciencias, Medicina Calles. 60Y120, 1900 La Plata, Argentina.

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Department of Internal Medicine III & Clinical Endocrinology, Medical Faculty Erasmus University Rotterdam, The Netherlands.

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Department of Obstetrics & Gynaecology, University of Sydney, New South Wales, 2006 Australia.

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Department of Biochemistry and Chemistry, Royal Free Hospital School of Medicine, University of London & Hunter Street, London WC1N1BP, U.K.

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Department of Pharmacology, University of Missouri Health Science Centre, Columbia-MO 65212, U.S.A.

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Laboratory of Biochemical Pharmacology, National Institute of Arthritis, Metabolism and Digestive Diseases, National Institute of Health, Bethesda, Maryland-22205.

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Department of Physiology, Medical College of Virginia, Richmond, Virginia-23298.

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Centre for Neurochemistry, Rockland Research Institute, Wardi Island, N. Y. 10035, USA.

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Department of Biological Sciences, Drexel University, Philadelphia, Pennsylvania-19104.

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A. F. Phillipps*, J. W. Dubin & J. R. Raye

Department of Pediatrics, The University of Connecticut, Health Centre, Farmington, Connecticut-06032.

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Department of Physiology, University of Turku, Kiinamyllynkatu, 10 SF-20520, Turku, Finland.

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I. L. Campbell & K. W. Taylor

Department of Biochemistry, The London Hospital Medical College, University of London, Turner Street, London W1 2

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Nuffield Department of Clinical Biochemistry John Radcliffe Hospital, Headington, Oxford OX3 9GU. U. K.

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O. Serri, E. Rasio & M. Somma*

Chief Service of Endocrinology, St. Mary's Hospital 1560 Sherbrooke, St. E., Montreal, P. Q. H2L 4K8, Canada

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G. J. Taborsky, Jr. & D. Porte, Jr.

Department of Medicine, University of Washington School of Medicine, Division of Endocrinology and Metabolism, Seattle Veterans Administration Medical Center, Seattle, Washington-98108.

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Centre for Air Environment Studies, The Pennsylvania State University, University Park, PA16802

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S. Kim*, Y. J. Yoon, I. Jatoi & Y. m

Department of Pharmacology, St., Louis University School of Medicine. St., Louis, Missouri-63104, U.S.A.

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Department of Histology & Embryology, Medical Faculty, J. E. Purkyne University, Brno.

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Laboratoire de Biochimie, I. N. S. E. R. M. U. 181, Faculté de Médecine, Saint-Antoine, 27, rue Chaligny, 75571 Paris, Cedex-12, France.

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N. Kraus-Friedmann & P. Zimnaik*

Marrs McLean Department of Biochemistry, Baylor College of Medicine, Houston, Texas 77030.

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Division of Metabolism, Veterans Administration Medical Center, 4435 Beacon Avenue South, Seattle, W. A98108.

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Department of Biological Chemistry, School of Medicine, University of California, Los Angeles, CA 90024, USA.

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T. P. Jacobs, E. S. Siris, J. P. Bilezikian
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Department of Medicine, College of Physicians & Surgeons, Room 8-436 630 West 168th Street, New-York N.Y.-10032.

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Department of Chemical Pharmacology, Pharmaceutical Sciences, Meijo University Nagoya, 468, Japan.

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S. Hixon & R. Wolfedden*

Department of Biochemistry, University of North Carolina, Chapel Hill NC 27514, U.S.A.

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C. Yoshino, T. Kazumi, S. Morita
S. Baba

C/o Room 73002, Medical Science Building, University of Toronto, Toronto, Canada M5S 1A8.

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W. C. Duckworth*, K. R. Rur
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Endocrinology and Metabolism Section, Medical Science, Veterans Administration Hospitals 1481 West Tenth Street Indianapolis, Indiana-460 02.

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O. Pedersen*, E. Hjollund, H. I. Nielsen, H. O. Lindstov, O. Sonne
J. Gliemann

Medical Department III Country Hospital, Tage Hansensgade D. K. Aarhus C. Denmark

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S. Adams and D. H. Walker

Department of Pathology, University of North Carolina School of Medicine, Chapel Hill, North Carolina

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The Rockefeller University, New-York, N. Y. 10021.

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A. Sanghvi*, E. Grassi, C. Bartman, R. Lester, M. Gallikienle & G. Galli

Department of Pathology, University of Pittsburgh, School of Medicine, Pittsburgh, PA 15261.

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D. H. Norback*, E. Mack, G. Reddy, J. Britt & M. T. Hsia

Wm. S. Middleton Memorial Veteran Hospital, 2500 Overlook Terrace, Madison, WI 53705.

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Laboratory of Molecular Pharmacology Developmental Therapeutics Program, Division of Cancer Treatment, National Cancer Institute, National Institute of Health, Bethesda, Maryland-20205.

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E. R. Carson, C. Cobelli*, L. Finkelstein

SADSEB-CNR, Copso Stati Uniti 4, 35100 Padova, Italy

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G. D. Norstedt, & J. A. Gustafsson†

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O. Ohnishi, K. Yamaguchi, S. Shimada, Y. Suzuki & A. Kumagai

Tokyo Research Laboratory, Mechida Pharmaceutical Co., Ltd., 1-1-1 Kamiya, Kita-Ku, Tokyo, 115, Japan.

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University of Oslo, Institute for Experimental Medical Research, Ulleval Hospital and Surgical Department, 2 Ulleval Hospital, Oslo 1, Norway.

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Department of Medicine Nine-wells Hospital & Medical School of Dundee, DD 954, Scotland.

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Department of Medicine, New Medical College Valhalla, New York 10595, U. S. A.

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C. Shapiro* & P. Girdwood

Department of Psychiatry, University of Edinburgh (Royal Edinburgh Hospital, Morningside Part, Edinburgh EH10 5JF, Scotland, U. K.

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P. K. Wong

Department of Pharmacology, New York Medical College, Valhalla, NY 10595, U.S.A.

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Department of Surgery, University of Queensland, Royal Brisbane Hospital, Herston, Queensland 4029, Australia

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M. Dahlburg, M. Snochowski & J. A. Gustafsson

Department of Reproductive Medicine, School of Medicine (M-025), University of California, San Diego, La Jolla, California 92093, U.S.A.

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C. Casanueva, R. Betti, D. Cocchi, P. Gianfranceschi, T. Motta & E. E. Muller*

Department of Pharmacology, University of Milan (F. C., R. B., D. C., P. Z., T. G.), via Vanvitelli, 32, 20129 Milan, Italy.

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Haffalitzky de Muckadill

Department of Surgical Gastroenterology C. H. Blegdams Hospital, University of Copenhagen, Copenhagen.

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K. Yamashita, M. Kusakabe & M. Sano

Department of Anatomy, Nagoya University School of Medicine, Nagoya 466, Japan.

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G. D. Holman, E. J. Pierce & W. D. Rees

Department of Biochemistry, University of Bath, Claverton Down, Bath BA2 7AA, U. K.

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G. J. P. Fernando-Warnakulasuriya, J. E. Stagger, S. C. Frost, & M. A. Wells*

Department of Biochemistry, College of Medicine, University of Arizona, Tucson, AZ 85724.

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Department of Biochemistry, College of Medicine, University of Arizona, Tucson, AZ 85724.

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M. Rola-pleszczynski and R. Blanchard

Division of Allergy and Clinical Immunology, Department of Pediatrics and Unite de Recherche Pulmonaire, Centre Hospitalier Universitaire, Sherbrooke, Que. Canada.

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T. Nakamura, C. Noda & A. Ichihara

Institute for Enzymes Research, School of Medicine, University of Tokushima, Tokushima 770, Japan.

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D. M. Nathan*, L. Axeprod, J. S. Flier & D. B. Carr

The Diabetes Unit and the Medical Service, Massachusetts General Hospital, Boston, MA 02114.

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The Laboratory of Pathophysiology, National Cancer Institute, Bethesda,

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P. Sandhya & U. N. Das*

Department of Genetics, Osmania University, Hyderabad-500 007.

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A. Schattner, D. Wallah, G. Martin, T. Hahn, S. Levin & M. Revel*

Department of Virology, Weizmann Institute of Science, Rehovot, Israel.

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Shida & S. Dales*

Microbiology Group, Department of Microbiology and Immunology, University of Western Ontario, London, Ontario, N6A 3K7, Canada.

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A. Watkins & J. R. Scott

Department of Microbiology, Emory University, Atlanta, Georgia 30322, USA.

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Lee & R. H. Schloemer*

Department of Microbiology & Immunology, Indiana University of Medicine, Indianapolis, Indiana 46223, U.S.A.

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Centre for Cancer Research and Department of Biology, Massachusetts Institute of Technology, Cambridge, Massachusetts 02139, USA.

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C. Lee & R. H. Schloemer*

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Department of Biology, University of West Florida, Pensacola, Florida 32504, U.S.A.

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Superintendent, Rajan Babu Tuberculosis Hospital, Kingway Camp, Delhi 110 009.

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Interc Disease Branch, Bacterial Diseases Division, Bureau of Epidemiology, Centre for Disease Control Atlanta, GA 30333, U.S.A.

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Department of Histopathology, St. George's Hospital Medical School, London, SW 17 ORE, U.K.

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Department of Chemotherapy, Haffkine Institute, Parel, Bombay 400 012.

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Department of Pharmacology, George's Medical College, Lucknow 226 003.

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B. T. Backus & L. Affronti*

Department of Microbiology, The George Washington University Medical Center, Washington DC 20037, U.S.A.

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Department of Microbiology, University of Maryland, College Park, Maryland 20742, USA.

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P. Hickerton & T. W. Jones*

Centre for Tropical Veterinary Medicine,
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International Centre for Diarrhoeal Diseases Research, B. G. P. O. 128, Dacca-2, Bangladesh.

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S. L. Pendalwar, D. T. Chandhari & M. R. Patel

Department of Chemotherapy, Haffkine Institute, Parel, Bombay 400 012, India.

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Assistant Professor of Chemotherapy,
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All India Institute of Hygiene & Public Health, 110, Chittaranjan Avenue, Calcutta-700 037.

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B. Aronsson, E. Bengtsson*, A. Bjorkman, P. O. Pehrson, L. Rombo & M. Wahlgren

Roslagstull Hospital, Box 5651, S-11489 Stockholm, Sweden.

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WHO Collaborating Centre for Trypanosomiasis and Preservation of Protozoa, Department of Medical Protozoology, London School of Hygiene and Tropical Medicine, Keppel Street, (Gower Street), London WC 1E 7HT, England.

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Calcutta School of Tropical Medicine, Calcutta.

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Department of Experimental Medicine, Internal Medicine and Biochemistry, Postgraduate Institute of Medical Education and Research, Chandigarh 160

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Cornell University Medical College, New York 10021, U.S.A.

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Centre for Disease Control, Public Health Service, US Department of Health, Education and Welfare, Atlanta, Georgia 30333, U.S.A.

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Department of Chemistry, Lucknow University, Lucknow 226 007.

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Janssen Pharmaceutica, Research Laboratories, B-2340 Beerse, Belgium.

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A. M. Osman, M. A. Abbady* & F. M. Atta

Chemistry Department, Faculty of Science,
Assiut University, Assiut, Egypt.

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Chemistry Department, University of
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Vector Control Research Centre,
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Department of Human Genetics, University of Pennsylvania, Philadelphia, Pa. 19104, U.S.A.

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Cancer Research Laboratory, Veterans Administration Medical Center, Department of Biochemistry, University of Tennessee Centre for the Health Sciences, Memphis, Tennessee-38104

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Laboratory of Immunodiagnosis, National
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Chemistry and Food Technology
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Department de Virologie, Institut Pasteur
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C. A. Cotte, G. C. Easty & A. M. Neville*
Ludwig Institute for Cancer Research,

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Clifton Avenue, Belmoat, Surry, SM2
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American Red Cross, Blood Services
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M. Volm, E. Mass & J. Mattern

Deutsches Krebsforschungszentrum,
Institut für Experimentale Pathologie,
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Department of Dermatology, Yale Uni-
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Basic Immunology Program, Fred Hutchinson Cancer Research Center, Seattle, WA 98104.

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Toxicology Unit, Department of Pharmacology, School of Pharmacy, University of London, 29/39 Brunswick Square, WC1N 1AX, U. K.

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The University Department of Surgery, The Welsh National School of Medicine, Health Park, Cardiff, CF4 4XN, U.K.

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Chemistry Division, Indian Drug Pharmaceutical Limited, Hyderabad 500037.

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State University of New York. Downstate
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Department of Chemistry and Laboratory
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Department of Medicine, Section of
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Department of Medicine, University
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Laboratory of Cell Physiology, Department of Life Chemistry, Graduate School of Nagatsuta, Tokyo Institute of Technology, Yokohama 227, Japan.

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Medical Research Council Group in Molecular Endocrinology, Le Centre Hospitalier de l'Université, Laval, Québec G1V 4G2, Canada.

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Prof. & Head, Department of Physics,
University of F. Surrey, U. K.

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Physiological Laboratory, Cambridge
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J. Sparkes

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K. S. Sharma, S. Kumari, & R. P. Singh

Maharshi Dayanand University, Department of Chemistry, Rohatak, 124001.

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D. Martin, H. Graubaum, G. Kempter, W. Ehrlichmann

Akad Wissensch DDR, Zent. Institute, Organic Chemistry, DDR-1199, Berlin, E. Germany.

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C. Kaneko, T. Naito & N. Nakayama

Kanazawa University, Faculty of Pharmaceutical Sciences, Kanazawa, Japan.

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V. E. Morquez, J. A. Kelly & J. S. Driscoll

NIH, NCI, Lab. Medical Chemistry & Biology, Bethesda, Maryland, 20205, U.S.A.

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T. Sano, J. Toda, N. Kashiwaba, Y. Tsuda, Y. Iitaka.

Showa Coll. of Pharmaceutical Sciences, Setagaya-ku, Tokyo, 154, Japan.

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V. G. Zubenko, N. S. Vorobeva, Z. K. Zemokov, T. I. Pekhk & A. A. Petrov.

Minist Petr. Ind. Inst. Geol. & Fuel Dev., Moscow, USSR. (in Russian).

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I. Jirkovsky & R. Baudy

Ayerst Laboratories, P.O. Box 6155, Montreal, POH3C3 J1, Canada.

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A. Shafiee & S. Sattari

Tehran University, Coll. of Pharmacy, Department of Chemistry, Tehran, Iran

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G. M. Cappola, R. E. Damon & C. Hardtmann

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University Pierre & Marie, Curie. Laboratory Chim. Heterocycles, F. 75 Paris, France.

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Prudue University, R. B. Wetzel Laboratory, West Lafayette, 47907.

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Fisher, and G. N. Henderson

University of Victoria Department of Chemistry, Victoria, BC V8WY2, Canada.

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D. Entwistle, B. J. Hussey, R. A. W. Hirst

University of Liverpool, Liverpool, L69 3GB, England.

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R. Williams & K. Nishitani

Indiana University, Department of Chemistry, Bloomington, In 47405.

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P183. A new one-pot synthesis of 2-arylmethyl-1, 2, 3, 4-tetrahydroisoquinoline derivatives from isoquinolinium salts.

T. Iwakuma, K. Yamada, N. Itoh & S. Sugawara

Tenabe seiyaku Co. Limited, Organic Research Laboratory, Saitama, Japan.

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R1P184. New methods and reagents in organic synthesis 12. Reaction of diethyl phosphorocyaniodate (DEPC) with aromatic oxides. A modified reisserthenze reaction.

S. Harusawa, Y. Hamada & T. Shioiri*

Nagoya City University, Fac. Pharmaceutical Sciences, Nagoya 467, Japan.

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Y. Watanabe, Y. Kamochi & T. Miyazaki

Dai ichi Coll. Pharmaceutical Science, Fukuoka 815, Japan.

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M. P. Cooke

Washington State University, Department of Chemistry, Pullman, WA, 99164.

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M. J. E. Hewlins, A. H. Jackson, A. M. Oliveiracampos, & P. V. R. Shannon.

University Coll, Cardiff, Department of Chemistry, Cardiff, CF1 1XL, Wales.

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P. Camps, C. Jaime, J. Molas

University of Autonomia Barcelona, FAC Ciencias, Department of Quimica Organization, Barcelona, Spain.

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P. G. Karmarkar, V. R. Chinchore & M. S. Wadia*

University of Poona, Department of Chemistry, Poona 411007.

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B. Myboh, H. Ila & H. Junjappa*

North Eastern Hill University, Department of Chemistry, Shillong, 793003.

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R81P191. Organometal compounds. 8. Improved synthesis of bromo- and iodotrimethylsilane.

A. H. Schmidt & M. Russ

Fachhochsch Fresenius, ABT Drug Chemistry, D 6200, Wiesbaden, West Germany.

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A. I. Blair, A. R. Boobis, D. S. Davies & T. M. Cresp

Royal Postgraduate Medicine School, Department of Clinical Pharmacology, London W12 0HS, England.

Tetrahedron Letters, **21**, 4947 (No. 1980)

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R. Knorr & A. Weiss

University of Munchen, Institute of Organic Chemistry, D-8000, Munich 2. West Germany.

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F. M. Simmross & P. Weyerstahl*

Techn. University, Berlin, Institute of Organic Chemistry, D-1000 Berlin 12, West Germany.

Synthesis, **No. 1**, 72 (1981)

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Y. Kikugawa

Josai University, Faculty of Pharmaceutical Sciences, Saitama 350-02, Japan.

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Trobe University, Department of Organic Chemistry, Bundoora, Vic 3083, Australia.

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Hoffmann-La Roche Inc., Chemistry Research Department, Nutley, NJ. 07110.

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M. S. Narasimhan, R. S. Mali & B. K. Kulkarni

University of Poona, Department of Chemistry, Poona 411 007.

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B. D. Tilak, V. N. Gogte, A. S. Modak

National Chemistry Laboratory, Poona 411 008.

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K. Krakowiak, R. Glinka & B. Kotelko.

Medicine Acid Lodz., Drug Chemical & Technology Institute, 90145, Lodz Poland.

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S. B. Hendi & L. D. Basanagoudar

Ciba-Geigy Research Centre, Gorgegaon, Bombay-400 063.

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Uni Claude Bernard Lyon 1, Laboratory of Chemical Organization, 69622 Villeurbanne, France.

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S. P. Doubhadel, S. M. Tuladhar, S. M. Tuladhar, & P. P. Wagley

Trubhuban University, Chemistry, Tructn. Committee, Kirtipur, Kathmandu, Nepal.

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G. Rovnyak, V. Shu & J. Schwartz

Squibb Institute of Medicinal Research, Princeton, N. J. 08540.

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K. S. Karanth, S. Gurumadhva Rao, T. K. Pandma Kumari & M. N. Guruswami*

Department of Pharmacology, Kasturba Medical College, Manipal-576 119.

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Y. Nishimura and J. E. Bailey

Department of Chemical Engineering, University of Houston, Houston, TX 77004.

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J. L. Meers*

John & E. Sturge Limited, Denson Road, Selby, North Yorkshire, U.K.

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J. C. Merchuk and Y. Stein

Department of Chemical Engineering, Ben Gurion University of the Negev, Beer Sheva, Israel.

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C.C. Baldry & A.C.R. Dean*

Physical Chemistry Laboratory, University
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OX1 3QZ, U.K.

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B. Jones & H. M. Schwartz

Department of Chemistry, University of
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Candida mobilis and *Saccharomyces uvarum*
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J. W. Nofsinger & R. J. Bothast

Northern Regional Research Center,
Agricultural Research. Science and
Education Administration, United States
Department of Agriculture, Peoria, IL
61604, U.S.A.

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D. DiBiasio, H. C. Lim* & W. A.
Weigand

School of Chemical Engineering, Purdue
University, West Lafayette, Indiana 47907,
U.S.A.

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Dieter Behrens

DECHEMA, Frankfurt.

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P. M. Galliher, C. L. Cooney*, R.
Lange & R. J. Linhardt

Department of Nutrition and Food
Science, Massachusetts Institute of
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02139, U.S.A.

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J. Klein† & M. Kluge

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T. Yamane & T. Shiotani

Department of Chemical Engineering,
Faculty of Engineering, Kansai University,
Suita, Osaka, 564, Japan.

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A. L. Colombo, N. Crespi-Perellino, A. Grein, A. Minghetti & C. Spalla

Ricerca & Sviluppo di Microbiologia Industriale, Farmitalia Carlo Erba, Via dei Gracchi 35, 20146 Milan, Italy.

Biotechnology Letters, **3**, 71 (Feb., 1981)

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P. G. Krouwel, W. F. M. Vander Laan & N. W. F. Kossen

Biotechnology Group, Department of Chemical Engineering, Delft University of Technology, Jaffalaan. 9, P. O. Box 5029, 2600 GA Delft, The Netherlands.

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R81R049. Microbial hydroxylation of steroids. 7. Hydroxylation of β -nortestosterone and related compounds by *Rhizopus oryzae* ATCC 11145, and ^{13}C nuclear magnetic resonance spectra of some steroids.

H. L. Holland

Department of Chemistry, Brock University, St. Catharines, Ont., L2S 3A1, Canada.

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S. Bower

Department of Anaesthesia, University of Newcastle Upon Tyne, Queen Victoria Road, New Castle Upon Tyne, NE1 7RU, U.K.

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R81R051. Production of yeast from corn stover hydrolysates.

A. Gonzalez-Valdes & M. Moo-young

Biochemical and Bioengineering Group, Department of Chemical Engineering, University of Waterloo, Waterloo, Ontario, Canada, N2L 3G1.

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S. Gong, Li fu Chen* & G. T. Tsao

Laboratory of Renewable Resource Engineering, A. A. Potter Engineering Center, Purdue University, West Lafayette, Indiana.

Biotechnology Letters, **3**, 125 (Mar., 1981)

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Y. Kawamura, K. Nakanishi, R. Matsuno & T. Kamikudo

Department of Food Science and Technology, Faculty of Agriculture, Kyoto University, Kyoto 606, Japan.

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FORTHCOMING MEETINGS

X Meeting of the International Study Group for Steroid Hormones (Convening physiological aspects of ovarian function, contraception, Male fertility and infertility, diagnosis of female infertility and treatment of female infertility).

Rome, Italy — December 2-4, 1981.

Prof. Carlo Conti
International Study Group for Steroid Hormones, Clinica Medica V, Polyclinic. Umberto 1, University di Roma 00100, Rome, Italy.

Third International Symposium on Equine Reproduction.

Australia—January 25-29, 1981.

Mr. P. D. Rosedale
Chairman IERS Committee
P. O. Box 371
Artarmon
New South Wales-2064, Australia.

POWTECH: International Powder Technology and Bulk Solids Exhibition.

U.K. March 2-5, 1982.

Specialists Exhibitions Ltd.,
Green Dragon House,
64 High Street,
Groyden, Surrey CR9 24H, U. K.

6th International Symposium on Coagulation Processes.

Karpacz near Wroclaw—August 1982.

Prof. Z. Wojcicki, Politechnika Warszawska, Nowowiejska 25 Pok. 313 20-665 Warszawa,

7th International Heat Transfer Conference.

Munich, F. R. G., — September 1982.

DECHEMA, P. O. B. 97 01 46
D-6000 Frankfurt (M) 97,
Federal Republic of Germany.

3rd International Congress on Filtration

Philadelphia September 13-17, 1982.

Mr. G. Marie,
134 AV. du Roule.
F 92 200 Neuilly, France.

6th London International Conference on Carbon.

London—September 20-24, 1982.

Society of Chemical Industry,
121, Belgrave Square,
London. SW1X 8PS. Great Britain

International Symposium on Chemical
Reaction Engineering.

Boston—October 4-6, 1982.

Prof. J. Wei,
Department of Chemical Engineering,
MIT, Cambridge, MA 02139, U. S. A.

International Symposium on The Phar-
macology of Thermoregulation.

Mas d'Artigny, Saint-Paul-deVence
Cote d'Azur,

France,—November 1-6, 1982.

Dr. Barry Ccx.
Biology Department
ICI Pharmaceuticals
Mereside, Alderley Park
Macclesfield, SK10 4TG, England.

Clinical Drug Development-Scientific and
Regulatory Strategies:—An International
Course.

University of Leiden—January 21-22,
1982.

Boerhaave Committee for Postgra-
duate
Medical Education
Academisch Ziekenhuis
Rijks Universiteit Leiden
Rijnsoorgerweg 10,
NL—2333 AA Leiden, The Nether-
lands.

A BIBLIOGRAPHY
ON
IMMUNOLOGY OF POX VIRUSES

by

Dr. L. M. Singh*

This bibliography on immunology of pox viruses arranged under ten sub-headings is the first major effort to bring together the world literature as ready reference to all those interested in this area of research; 1. Adjuvanticity, 2. Antigens, 3. Immunodeficiency, 4. Immunodiagnosis, 5. Delayed hypersensitivity, 6. Other immune interactions, 7. Cellular Immunity, 8. Vaccines, 9. The early work and life of Sir Edward Jenner, and 10. Eradication of smallpox. The write up that follows gives a bird's eye view of the state of knowledge in this field.

In each group, entries have been arranged alphabetically by name of first author. The format of the entry is: name(s) of author(s), year, title of the article, name of the periodical, volume no. and page no. Source publications for this bibliography are those available at the CDRI Library, both primary and secondary periodicals.

Adjuvanticity

Vaccinia virus, well-known for its

immuno-adjuvanticity effect is used in the remission and treatment of leukemias, malignant melanomas and other neoplastic diseases. The mechanism of its adjuvanticity is, however, unknown.

Antigens

The most important contributions in this area have been that (i) a nucleocapsid protein (NP) antigen common to all pox viruses have been demonstrated, (ii) VICSA, a new cell surface antigen has been identified (iii) the immunological properties of soluble antigens have been investigated and (iv) a polypeptide antigen, a glycoprotein in nature, responsible for haemagglutination reaction, has been identified. The polypeptide profiles of three strains of poxviruses: Vaccinia, Cowpox and Shope fibromas have been determined. A cross reactive polypeptide antigen among the three strains have been identified. The extracellular and intracellular forms of poxviruses have been found to differ in respect of their envelope composition, geneicity, haemagglutination, adsorption, penetration, commensalism, pathogenicity and polyphagocytosis.

*Scientist-in-Charge, Division of Virology, CDRI, Lucknow.

Immunodeficiency

Immunodeficiency diseases offer a model explaining the role of cellular and humoral immunities against invading microbes.

Immunodiagnosis

Immune peroxidase and immune electron microscopy have been evolved as rapid and specific tools for the diagnosis of smallpox and other pox virus infections.

Delayed hypersensitivity

The role of soluble antigen in eliciting a delayed hypersensitive reaction has been recognised.

Cellular immune interactions

The identification and interrelationship of the variola/vaccinia sub-group of pox viruses have been achieved by currently developed immunological techniques.

Cellular immunity

The significance of cellular immunity in limiting primary viral infections has now been well established. The key roles of cytotoxic T cells and histocompatibility antigen in bringing about cytotoxic killing of virus-infected target cells have been assigned.

Vaccines

A Stable freeze-dried small pox vaccine made in monolayer cultures of primary rabbit kidney cells and a similar vaccine from human diploid cells are in clinical trials.

Eradication

Global eradication of smallpox is a commendable achievement of the present time and for this, WHO deserves all appreciation.

Adjuvant activity

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nderson

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The Biochemical J. (Molecular Aspect),
93, 801 (1 Mar., 1981)

R81A292. Adsorption chromatogra- phic separation of (125 I) progesterone succinyl-tyrosine methyl ester.

G. Toth, M. Wiber & F. Kling

Institute of Isotopes of the Hungarian
Academy of Sciences, P. O. Box 77, H-
525 Budapest, Hungary.

J. of Chromatography, 213, 511 (4 Sep.,
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R81A293. An analytical study of the neuro-secretory cells of the brain in *Philoscimia ricini* (Mutt.) (*Lepidoptera* *saturniidae*) during post embryonic development.

V. B. Awasthi & U. V. Singh

Department of Zoology, University of
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Experientia, 37, 372 (1981)

R81A294. Androgen receptors in primate foetal fibroblasts: Prelimi- nary results.

S. Sultan, A. Terraza, B. Descomps & A.
C. D. Paulbt

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Steroides, I.N.S.E.R.M., U 58,60, rue
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France.

Societe de Biologie, 175, 208 (No. 2, 1981)

R81A295. Antibodies to human chorionic gonadotropin in humans.

K. Musch, A. S. Wolf & C. Lauritzen

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University of Ulm, Pittwitzstr, 43, D-7900
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many.

Clinica Chimica Acta, 113, 95 (2 Jun.,
1981)

R81A296. The antifertility action of a chlorohydrin: Metabolism by rat and boar sperm.

A. R. Jones, D. Stevenson, P. Hutton, &
A. G. Dawson

Department of Biochemistry, University
of Sydney, Sydney (NSW 2006,) Australia.

Experientia, 37, 340 (1981)

R81A297. Antigluco-corticoid activity of androgens in rat thymus lymphocytes.

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Department of Biochemistry, Hadassah University Hospital, Mount Scopus, P.O. Box 24035, Jerusalem, Israel.

Endocrinology, **108**, 760 (Mar., 1981)

R81A298. Antithyroidal activity of 1-alkyl/aryl-S-(2-N-methyl imidazolyl) isothiuronium dihydro chlorides.

M. B. Gupta, M. D. Mishra & P. K. Srivastava

Department of Chemistry, Banaras Hindu University, Varanasi 221005.

European J. of Medicinal Chemistry, **16**, 282 (May-Jun., 1981)

R81A299. Biomimetic total synthesis of steroids. Part V. Stereoselective synthesis of 12 α -methyl 12-nor-steroids.

A. I. A. Broess, N. P. Vanvliet, & F. J. Zeelen*

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J. of Chemical Research, (1), 20 (Jan., 1981)

R81A300. Bromo-criptine induced implantation during lactation in the rat.

P. F. Flint & M. B. Renfree

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J. of Reproduction and Fertility, **62**, 181 (May, 1981)

R81A301. Characterization of surface and seminal plasma glycoproteins of the chimpanzee.

G. E. Olson & K. G. Gould

Department of Anatomy, Vanderbilt University, Nashville, Tennessee 37203, U. S. A.

J. of Reproduction and Fertility, **62**, (May, 1981)

R81A302. Changes in physiologic free circulating estradiol and testosterone during exposure to norgestrel.

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Department of Obstetrics and Gynecology, Women's Hospital, 1240 N. Mission Road, Los Angeles, California 90033, USA.

J. of Clinical Endocrinology and Metabolism, **52**, 138 (Jan., 1981)

R81A303. Concentrations of aldosterone, corticosterone, 11-deoxycorticosterone, progesterone, 17-hydroxyprogesterone, 11-deoxycortisol, cortisol and cortisone determined simultaneously in human amniotic fluid throughout gestation.

W. G. Sippell, W. M. Holve, H. G. D. F. Bidlingmaier, & D. Knorr

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J. of Clinical Endocrinology and Metabolism, **52**, 385 (Mar. 1981)

R81A304. Contractibility of seminiferous tubules as related to sperm transport in the male.

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R. J. Tesi

Department of Biology, UMC53, Utah
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Archives of Andrology, **6**, 283 (4 Jun., 1981)

R81A305. Correlation between metabolism of betamethasone 17, β -dipropionate and adrenal hypertrophy in rat fetuses.

M. Nakano, M. Nishiuchi, M. Takeuchi
H. Yamada

Shionogi Research Laboratories, Shionogi
Co. Ltd., Fukushima-ku, Osaka 553,
Japan.

Steroids **37**, 511 (May, 1981)

R81A306. Cortisol production and metabolism in the late gestation rhesus monkey fetus.

B. F. Mitchell, M. S. Ferre, D. L. Hess,
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Reproductive Endocrinology Center,
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Endocrinology, **108**, 916 (Mar., 1981)

R81A307. Danazol, a new steroidal inducer of δ -aminolevulinic acid synthetase.

M. J. Hughes & A. B. Rifkind

Department of Pharmacology, Cornell
University Medical College, 1300 York
New York Avenue, N. Y. 10021, U.S.A.

J. of Clinical Endocrinology and Metabolism,
52, 549 (Mar. 1981)

R81A308. Des-ser salmon calcitonin: A Biologically potent synthetic analog.

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Veterans Administration Medical Center
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Endocrinology, **108**, 831 (Mar., 1981)

R81A309. Development of the capacity of mouse mammary glands for medium chain fatty acid synthesis during pregnancy and lactation.

S. Smith & A. Stern

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tory, Children's Hospital Medical Center,
51st and Groove Streets, Oakland
CA94609, U. S. A.

Biochimica et Biophysica Acta, **664**, 611 (23
Jun., 1981)

R81A310. Dibutyryl cyclic AMP decreases capacitation time *in vitro* in mouse spermatozoa.

L. R. Fraser

Department of Human Biology, Chelsea
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J. of Reproduction and Fertility, **62**, 63 (May,
1981)

R81A311. Differences between oestrogen receptor activation of oestrogen and antioestrogen.

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Unite d' Endocrinologie Cellulaire et Moleculaire, U 148 INSERM, 60, Rue de Navacelles, 34100 Montpellier, France.

Nature, **292**, 257 (16 Jul., 1981)

R81A312. Differential effects of luteinizing hormone-releasing hormone on follicle stimulating hormone dependent responses in rat granulosa cells and sertoli cells *in vitro*.

R. E. G. Langton, M. Lacroix & J. H. Dorrington

Banting and Best Department of Medical Research, University of Toronto, Toronto, Ontario, Canada.

Endocrinology, **108**, 812 (Mar., 1981)

R81A313. Diurnal variations in plasma testosterone in a male nocturnal primate, the owl monkey (*Aotus trivirgatus*).

A. F. Dixon & J. S. Gardner

Institute of Zoology, Wellcome Laboratories of Comparative Physiology, Zoological Society of London, Regent Park, London NW1 8RY, U. K.

J. of Reproduction and Fertility, **69**, 83 (May, 1981)

R81A314. A DNA-binding fraction from mouse kidney 3-ketosteroid reductase. Comparison with androgen receptor.

S. J. Wieland & T. O. Fox

Department of Neuroscience, Children's Hospital Medical Center, Harvard Medical School, Boston, Massachusetts 02115, U. S. A.

Steroids International J., **37**, 527 (1981)

R81A315. Effect of adrenoceptor blockers and maoi on postcoital uterine oviductal contractility, sperm transport and sperm attachment to eggs in rabbits.

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Archives of Andrology, **6**, 307 (4 1981)

R81A316. Effect of calcium and potassium on basal and gonadotropin-releasing hormone (Gn RH) stimulated release of luteinizing hormone (LH).

J. C. Zolman & L. J. Valenta

University of California, Irvine Department of Medicine 101 City Drive South, Orange, California 92668, U.S.A.

Acta Endocrinologica, **97**, 26 (May, 1981)

R81A317. Effect of dihydrotestosterone on follicular development, ovulation and reproductive capacity of mice.

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Institute for Research in Reproduction,
Mumbai, Bombay 400012.

J. of Reproduction and Fertility, **62**, 21 (May, 1981)

R81A318. Effect of oestrogen on pregnancy of guinea-pigs.

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J. of Reproduction and Fertility, **62**, 295 (May 1981)

R81A319. The effects of androgens and estrogens on human prostatic cells in culture.

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Road, Ottawa, Ont, Canada K1M 8L6.

Canadian J. of Physiology and Pharmacology, **59**, 949 (Sep., 1981)

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A. R. Rao

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Division of Biological Sciences and Department of Psychology, University of Missouri-Columbia, Columbia, Missouri 65211, U.S.A.

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Department of Obstetrics and Gynecology, The University of Texas Health Science Center at San Antonio, 7703 Floyd Curl Drive, San Antonio, Texas 78284, U.S.A.

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G. C. Majumdar

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Department of Obstetrics and Gynaecology and Biological Chemistry, The University of Michigan Medical School, Ann Arbor, Michigan 48109, U.S.A.

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Hospital Saint-Vincent de Paul, Avenue Denfert-Rochereau, 75014, France

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EECE-11E, Veterans Administration Medical Center, Sepulveda, California 91343, U.S.A.

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Laboratoire de Physiologie Animale, BP 108 X, 38041 Grenoble, Cedex, France.

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Departments of Clinical Chemistry, and Oncology, University of Lund, Malmö General Hospital, S-21401 Malmö, Sweden.

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Endocrine Unit, Royal Post Graduate Medical School, Nammersmith Hospital, Du Cane Road, London W12 0NS, England.

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Department of Clinical Chemistry, University Hospital, S-22185 Lund, S

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Endocrinology and Reproduction Research Branch, National Institute of Child Health and Human Development, National Institutes of Health, Bethesda, Maryland 20205, U.S.A.

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Institute of Behaviour Research Group and
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Hospital Clinico Universitario, University
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Department of Pharmacology and Pedia-
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R. Sridaran, R. Basuray & G. Gibori*

Department of Physiology and Biophysics,
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Director, Reproductive Endocrinology and
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Division of Visual Science, Illinois College of Optometry, 3241 South Michigan Michigan Avenue, Chicago, IL 60616, U.S.A.

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Department of Psychiatry & Behavioral Sciences, University of Texas Medical School, P. O. Box 20708, Houston, Texas 77025, U.S.A.

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Section of Neurophysiology, Department
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milk and plasma.**

W. A. Findlay, R. L. DeAngelis, M. F.
Kearney, R. M. Welch & J. M. Findley

Department of Medical Biochemistry,
Wellcome Research Laboratory, 3030
Cornwallis Rd., Research Triangle Park,
NC 27709, U.S.A.

Clinical Pharmacology and Therapeutics, **29**,
625 (May, 1981)

**B346. Androgen increases forma-
tion of behaviourally effective oes-
trogen in dove brain.**

T. Steimmler & J. B. Hutchison

Department de Biochimie Medical Centre,
Medical Universitaire, 1 Rue Michel-
servet, CH-1211, Geneva, Switzerland.

Nature, **292**, 345 (23 Jul., 1981)

**B347. Antibodies against the
membrane bound acetylcholinesterase
from adult rat brain.**

J. P. Zanetta, Z. Rakoneczay, A. Reeber,
P. Kasa & G. Vincendou

Centre de Neurochimie de CNRS, 5 Rue
Blaise Pascal, 67084 Strasbourg, Cedex,
France.

FEBS Letters, **129**, 293 (6 Jul., 1981)

**B348. Anti-inflammatory and
antirheumatic drugs.**

J. L. Abruzzo

Department of Medicine, Temple Medi-
cal College, Philadelphia, Pennsylvania,
U.S.A.

Annals of Internal Medicine, **94**, 270 (Feb.,
1981)

R81B349. Aspirin and acetaminophen.

A. Soffer (Editor)

P. O. Box 776, Park Ridge, IL 60068,
U.S.A.*Special Issue of Archives of International Medicine*, **141**, 273-404 (23 Feb., 1981)**R81B350. Assessment of anti-psychotic drugs.**

A. V. P. Mackay

Argyll and Bute Hospital, Argyllshire, U.K.

British J. of Clinical Pharmacology, **11**, 225
(Mar., 1981)**R81B351. Axonal transport: Each major rate component reflects the movement of distinct macromolecular complexes.**M. Tytell, N. M. Black, J. A. Garne &
R. J. LasekDepartment of Anatomy, Bowman Gray
School of Medicine, Winston-Salem,
North Carolina, 27103, U.S.A.*Science*, **214**, 179 (9 Oct., 1981)**R81B352. Behavioral depression produced by an uncontrollable stressor: Relationship to norepinephrine, dopamine, and serotonin levels in various regions of rat brain.**J. M. Weiss, P. A. Goodman, B. G. Losito,
S. Corrigan, J. M. Charry & W. H. BaileyThe Rockefeller University, New York,
N. Y. 10021, U.S.A.*Brain Research Reviews*, **3**, 167 (Oct., 1981)**R81B353. Benzodiazepines—a clinical review.**

A. N. Nicholson

Royal Airforce Institute of Aviation
Medicine, Farnborough, Hampshire,
U.K.*British J. of Clinical Pharmacology*,
(Suppl. 1), 35**R81B354. Benzodiazepines reduce stress augmented increase in urine monoamine oxidase inhibition.**

V. Glover, S. R. Bhattacharya, M. S. Sandler & S. E. File

Bernhard Baron Memorial Research
Laboratories and Instituted of Obstetrics
and Gynecology, Queen Charlott's Maternity
Hospital, London W60XG, U.K.*Nature*, **292**, 347 (23 July., 1981)**R81B355. Binding and metabolism studies with (3H) (D-Ala², Leu⁵) enkephalinamide and (3H) (D-Ala², Pro⁵) enkephalinamide: evidence for selective interaction of (D-Ala², Pro⁵) enkephalinamide with μ -receptors.**Laboratoire de Pharmacologie et de Toxicologie
Fondamentales, 205 route de Narbonne,
31078 Toulouse Cedex, France*European J. of Pharmacology*, **74**, 273
(Sep., 1981)

R81B356. Binding of (^3H) ethyl β -carboline-3-carboxylate to brain benzodiazepine receptors: Effects of drugs and anions.

F. Williams, S. M. Paul, K. C. Ria, C. Cain & P. Skolnick*

National Institute of Health, Building 4, Room 212, Bethesda, MD 20205, U.S.A.

EBS Letters, **132**, 269 (28 Sep., 1981)

R81B357. Binding of (^3H)-pilocarpine to membranes from rat cerebral cortex.

L. Hedlund* & T. Bartfai

Department of Biochemistry, Arrhenius Laboratory, University of Stockholm, S-10691, Stockholm, Sweden.

Archives of Pharmacology, **317**, 126 (Sep., 1981)

R81B358. Bombesin-like immunoreactivity in human cerebrospinal fluid.

T. Yamada, M. Takami & R. H. Gerner

Center for Ulcer Research and Education, VA Wadsworth Medical Center and UCLA Medical School, Los Angeles, CA 90073, U.S.A.

Brain Research, **223**, 214 (26 Oct., 1981)

R81B359. Caffeine antagonizes several central effects of Diazepam.

P. Pole, E. P. Bonetti, L. P. Leri, R. Cumin, R. M. Angivi, M. Mohler and W. E. Haefely

Pharmaceutical Research Department, F. Hoffmann-La Recher., Ltd., 4002, Basle, Switzerland.

Life Sciences, **28**, 2265 (18 May, 1981)

R81B360. Changes in miniature endplate potential frequency during repetitive nerve stimulation in the presence of Ca^{2+} , Ba^{2+} and Sr^{2+} at the frog neuromuscular junction.

J. E. Zengel & K. L. Magleby

Department of Neuroscience & Neurosurgery, University of Florida College of Medicine, Gainesville, Florida 32610, U.S.A.

J. of General Physiology, **77**, 503 (May, 1981)

R81B361. Central effects of morphine levorphanol, (—) methidine & the opioid-like peptides. β -endorphin and P-alanine 2-methionine enkephalinamide on urine volume outflow and electrolytes.

J. P. Huidobro-Tora & F. Huidobro

Department of Pharmacology, School of Medicine, University of California San Francisco, San Francisco, California 94143, U.S.A.

J. of Pharmacology and Experimental Therapeutics, **217**, 579 (Jun., 1981)

R81B362. Characterization of a pulsative nicotinic acetylcholine receptor in mammalian brain.

B. J. Morley & G. E. Kemp

The Boys Town Institute for Communication Disorders in Children, Omaha, Nebr. 68131.

Brain Research Reviews, **3**, 81 ((Aug., 1981)
Brain Research, **228**, 1 (1981)

R81B363. Clinical assessment of neuromuscular transmission.

J. P. Payne and R. Hughes*

Pharmacology Department, The Wellcome Research Laboratories, Langley Court, Beckenham, Kent BR3 3BS.

British Journal of Clinical Pharmacology, **11**, 537, (Jun., 1981)

R81B364. Comparative characteristics of neuroleptics as noradrenaline and dopamin antagonists.

I.I. Abraniets, K. A. Arnoldova, A. T. Dalzhenko & I. V. Komissarov†

Pharmacology and Toxicology **44**, 287 (No. 3, 1981)

R81B365. Conditions required for the inhibitory feed back loops in noradrenergic transmission.

D. E. Story, M. W. McCulloch, M. J. Rand & C. A. Standford Starr

Department of Pharmacology University of Melbourne, Victoria 3052, Australia.

Nature, **293**, 62 (3 Sep., 1981)

R81B366. Cutaneous and muscle afferent components of the cerebral potential evoked by electrical stimulation of human peripheral nerves.

D. Bwike, N. F. Skuse & A. K. Lethlean

Unit of Clinical Neurophysiology, Division of Neurology, The Prince Henry Hospital, Little Bay, N.S.W. 2036.

Electroencephalography and Clinical Neurophysiology, **51**, 579 (Jun., 1981)

† Address not available

R81B367. Cutaneous depression of Ib reflex pathways to motoneurons in man.

E. P. Deseilligny, C. Bergego, R. Katz & C. Morin

Reduction Hospital de la Salpêtrière, 47 Bd de l'Hôpital, F-75651, Paris Cedex 13, France.

Experimental Brain Research, **42**, 351 (1981)

R81B368. Cytochemical study of enzyme activity associated with cerebrospinal fluid secretion in the choroid plexus and ventricular ependyma.

T. Masuzawa, T. Saito & F. Sato

Department of surgical Neurology and J. Chi Medical School, Kawachigun, Tochigi-ken, Japan.

Brain Research, **222**, 309 (19 Oct., 1981)

R81B369. Dendritic territories of cat retinal ganglion cells.

H. Wässle, L. Peichl & B. B. Boycott

Max-Planck-Institut für Hirnforschung, Deutschordenstr. 46, D-6000 Frankfurt am Main M71, Federal Republic of Germany.

Nature, **292**, 344 (23 Jul., 1981)

R81B370. Dopaminergic neurons in the rat ventral tegmental area. Identification and characterization.

R. Y. Wang

Department of Pharmacology, St. Louis University School of Medicine, 1402 S. Grand Blvd. St. Louis, MO 63104, U.S.A.

Brain Research, Reviews, **3**, 123 (Oct., 1981)

R81B371. Dopaminergic neurons in the rat ventral tegmental area. II. Evidence for autoregulation.

Y. Wang

Department of Pharmacology, St. Louis University School of Medicine, 1402 S. Grand Blvd, St. Louis, MO 63104, U.S.A.

Brain Research Reviews, **3**, 141 (Oct., 1981)

R81B372. Dopaminergic neurons in the rat ventral tegmental area. III. Effects of D- and L-amphetamine.

Y. Wang

Department of Pharmacology, St. Louis University School of Medicine, 1402 S. Grand Blvd. St. Louis, MO 63104, U.S.A.

Brain Research Reviews, **3**, 153 (Oct., 1981)

R81B373. Effect of adrenaline synthesis inhibition on brain noradrenaline neurons in locus coeruleus.

G. Engberg, M. Elam & T. H. Svensson.

Department of Pharmacology, University of Goteborg, Box 33 031 S40033, Goteborg Sweden.

Brain Research, **223**, 49 (26 Oct., 1981)

R81B374. Effect of cadmium on ethanol induced sleeping time in mice.

H. A. Yamamoto, D. Sutoo & S. Misawa
Institute of Community Medicine, University of Tsukuba Niihari, Ibaraki 305, Japan.

Life Sciences, **28**, 2917 (29 Jun., 1981)

R81B375. Effect of caroxazone, a new anti-depressant drug on monoamine oxidases in healthy volunteers.

A. Moretti, C. Caccia, A. Martini, L. Bonollo, A. Amico, R. Segal, V. Nicoletta & F. B. Nicolis

Biochemical Pharmacology. Farmilalia-Carlo-Erba Research Institute, 20014-Nerviano (Milan), Italy.

British J. of Clinical Pharmacology, **11**, 511 (May, 1981)

R81B376. Effect of chemical environment on levels of substance-P and somatostatin in cultured sensory neurones.

A. W. Mudge

MRC Neuroimmunology Project, Department of Zoology, University College London, Gower street, London, WC1E 6 BT, U. K.

Nature, **292**, 764 (20 Aug., 1981)

R81B377. Effects of exogenous β -endorphin on pituitary hormone secretion and its disappearance rate in normal human subjects.

R. L. Reid, J. D. Hoff, S. S. C. Yen & C. H. Li

Department of Reproductive Medicine (T-002), University of California, San Diego, School of Medicine, La Jolla, California 92093, U. S. A.

J. of Clinical Endocrinology and Metabolism, **52**, 1179 (Jun., 1981)

R81B378. Effect of local anesthetics on immune reactivity. (GVHR/graft rejection).

L. Draberova, K. Nouza*

Institute of Experimental Medicine, Czechoslovak Academy of Science, 14220 Praha.

Folia Biologica, **27**, 107 (Nov., 2, 1981)

R81B379. Effect of 2-nicotinamidethyl nitrate (SG-75) on membrane potentials of canine Purkinje fibres.

T. Yanagisawa & N. Taira

Department of Pharmacology, Tohoku University School of Medicine, Sendai 920, Japan.

Japanese J. of Pharmacology, **31**, 409 (Jun., 1981)

R81B380. The effect of pentobarbital on Central somatosensory conduction time in the rat.

N. A. Shaw & B. R. Cant

Department of Physiology, School of Medicine, University of Auckland, Auckland 1, New Zealand.

Electroencephalography and Clinical Neurophysiology, **51**, 674 (Jun., 1981)

R81B381. The effect of phencyclidine on the turnover rate of acetylcholine in various regions of rat brain.

T. F. Murray & D. L. Cheney

Laboratory of Preclinical Pharmacology, National Institute of Mental Health, Saint Elizabeths Hospital, Washington, D. C., U. S. A.

J. of Pharmacology and Experimental Therapeutics, **217**, 733 (Jun., 1981)

R81B382. The effect of prostaglandin E₂ on increased naloxone potency induced by morphine pretreatment.

C. L. Wong & M. K. Wai

Department of Pharmacology, Faculty of Medicine, University of Hong Kong, Sassoon Road, Hong Kong.

European J. of Pharmacology, **74**, 365 (Sept., 1981)

R81B383. Effect of temazepam and temazepam-ethanol on sleep.

W. Lehmann & B. Liljenberg

Department of Psychiatry Academic Hospital S-75015 Uppsala, Sweden.

European J. of Clinical Pharmacology, **201** (Nov., 1981)

R81B384. The effect of the selective activation of different peripheral nerve fiber groups on the somatosensory evoked potentials in the cat.

D. Alpsan

Department of Biological Sciences, Middle East Technical University, Ankara, Turkey.

Electroencephalography and Clinical Neurophysiology, **51**, 589, (Jun., 1981)

B385. Effects of α -dopa on dopamine and norepinephrine concentrations in rat brain assessed by gas chromatography.

S. Doshi & D. J. Edwards*

Department of Pharmacology & Physiology School of Dental Medicine University of Pittsburgh, 541 Salk Hall, Pittsburgh PA 15261, U. S. A.

Journal of Chromatography, **210**, 505 (19 Jun., 1981)

B386. Effects of α -dopa, chlorpromazine and apomorphine on brain monoamines and free amino acids in rats.

M. Kolyuneuoglu, S. Atamer-Simsek and M. Keyer-Uysal

Max-Planck-Institute for experimental Medicine, Department of Molecular Genetics, Hermannreiter Str 3, 3400 Göttingen, Federal Republic of Germany.

Pharmacological Research Communications, **13**, 787 (Sep., 1981)

B387. Effects of M. K.-771, a novel TRH analog, on brain dopaminergic and serotonergic systems.

R. B. Rastogi, R. L. Singhal*, Y. D. Lapiere

Department of Pharmacology, Faculty of Health Science University of Ottawa, 275 Nicholas Street, Ottawa, Ontario, K1N 9A9, Canada.

European J. of Pharmacology, **73**, 307 (14 Aug., 1981)

B388. Effects of centrophenoxine, priracetam and hydergine on rat brain lipid peroxidation.

D. D. Jamieson & K. M. Taylor

Roche Research Institute of Marine Pharmacology P. O. Box 255, Dee Why, 2099 N.S.W., Australia.

Experimentia, **37**, 879 (15 Aug., 1981)

B389. The effects of neuroleptics on the gaba receptor of cat primary afferent neurons.

H. Higashi, H. Inokuchi, S. Nishi, K. Inanaga & J. P. Gallagher*

Department of Pharmacology and Toxicology, University of Texas Medical Branch, Galveston, Texas, 77550, U.S.A.

Brain Research, **222**, 103 (5 Oct., 1981)

B390. Effect of sciatic nerve stimulation on ACTH secretion, in intact and in variously hypothalamic deafferentated male rats.

S. Feldman, N. Conforti, I. Chowers & R. A. Siegel

Laboratory of Neurophysiology and Experimental Endocrinology, Department of Neurology, Hadassah University Hospital and Hebrew University, Hadassah Medical School, Jerusalem, Israel.

Experimental Brain Research, **42**, 486, (1981)

R81B391. Efferent connections of the cingulate gyrus in the rhesus monkey.

D. N. Pandya, G. W. Van Hoe Sen & M. M. Mesulam

Edith Nourse Rogers Memorial Veterans Hospital, 200 Spring Road, Bedford, MA 01730 U.S.A.

Experimental Brain Research, **42**, 319, (1981)

R81B392. An electron microscopic study on substance P-like immunoreactive nerve fibers in the celiac ganglion of guinea pigs.

H. Kondo & R. Yui

Department of Anatomy, Niigata University School of Medicine, Niigata, 951, Japan.

Brain Research, **222**, 134, (5 Oct., 1981)

R81B393. Electrophysiological effects of diisopropylfluorophosphate on neuromuscular transmission.

G. G. Bierkamper

Department of Environmental Health Science, The Johns Hopkins University, 615 North Wolfe Street, Baltimore, MD 21205 U.S.A.

European J. of Pharmacology, **73**, 343 (14 Aug., 1981)

R81B394. Energy dispersive X-ray microanalysis of monovalent electrolytes in large brain cortical cells of rats after chronic reserpine treatment.

C. Peeri, C. Giuli & C. Bertoni—Freddari

Centre of Cytology, Italian section of V. I. L. E. G., Gerontological Research Department of I. N. R. C. A., Via Relloli 8, 60100 Ancona, Italy.

Pharmacological Research Communications **797**, (Sep., 1981)

R81B395. Enkephalins induce a metrical effects on posture in the

E. I. Chazov, G. Ya Bakalkin, E. Yarigin, E. D. Trushina, M. I. Titov, V. N. Smirnov

U.S.S.R. Research Centre of Cardiology Academy of Medical Science, Petrovsky lane, Moscow 101837, U.S.S.R.

Experientia, **37**, 887 (15 Aug., 1981)

R81B396. Evaluation of a synaptic model for monitoring in changes in the gaba and glutamate content of nerve endings.

J. D. Wood

Department of Biochemistry, University of Saskatchewan, Saskatoon, Saskatchewan, Canada S7 NOWO.

International J. of Biochemistry, **13**(5), (1981)

R81B397. Evaluation of a general anesthetic isoflurane.

H. W. Linde & M. H. M. Dykes

Department of Anesthesia, Northwestern University, 303E Chicago Ave, Chicago, IL 60611, U.S.A.

J. of the American Medical Association, **2335** (12 Jun., 1981)

3398. Evidence for an action of morphine and the enkephalins on sensory nerve endings in the mouse brainstem.

A. Bentley, S. H. Newton & J. Starr

Department of Pharmacology, Monash University, Wellington Road, Clayton, Victoria, Australia.

British J. of Pharmacology, **73**, 325 (Jun., 1981)

B399. Fast inward and outward potassium currents in a non-spiking neuron.

M. Mirroli

Indiana University, School of Medicine, Medical Sciences Program, Physiology Division, Myers Hall, Bloomington, Indiana 47405, USA.

Neuroscience, **292**, 251 (16 Jul., 1981)

B400. Fenoprofen & codeine analgesia.

L. Laska & A. Sunshine

Pharmaceutical Sciences Division, Rockland Research Institute, Orangeburg, New York 10962, U.S.A.

Clinical Pharmacology and Therapeutics, **29**, 66 (May, 1981)

B401. Fluproquazone—A new analgesic drug (17 research papers, in this issue, dealing with it).

Verlag Publication.

Arzneimittel Forschung: Drug Research, **31**, 1 (1981)

R81B402. Functional and anatomical segregation of hypothalamic opiate receptors involved in prolactin and growth hormone secretion in cynomolgus monkeys.

P. E. Belchetz

Department of Endocrinology, St. Bartholomew's Hospital, London EC1A 7BE, U.K.

Life Sciences, **28**, 2961 (29 Jun., 1981)

R81B403. Haloperidol-induced supersensitivity to the discrimination of apomorphine.

M. D. Schchter

Department of Pharmacology, North Eastern Ohio Universities College of Medicine, Rootstown, Ohio 44272, U.S.A.

European J. of Pharmacology, **74**, 343 (24 Sep., 1981)

R81B404. A heat stable inhibitor protein for bovine brain cyclic nucleotide phosphodiesterase from *Escherichia coli*.

Y. Iwasa, K. Yanemitsu, K. Matsui, K. Fukunaga & E. Miyamoto

Department of Pharmacology, Kumamoto University Medical School, Kumamoto 860, Japan.

FEBS Letters, **128**, 311 (15 Jun., 1981)

R81B405. High affinity (3H) desipramine binding in rat cerebral cortex decreases after selective lesion of noradrenergic neurons with 6-hydroxydopamine.

P. D. Hrdina, K. Elson-Hartman, D. C. S. Roberts & B. A. Pappas

Department of Pharmacology, Faculty of Health Sciences, University of Ottawa, 275 Nicholas St., Ottawa, Ontario, Canada K1N 9A9.

European J. of Pharmacology, **73**, 375 (14 Aug., 1981)

R81B406. Hind brain GABA receptors influence parasympathetic outflow to the stomach.

D. L. Williford, H. S. Ormsbee III, W. Norman, J. W. Harmon, T. Q. Garvey III, J. A. Dimicco & R. A. Gillis

Department of Pharmacology, Georgetown University, Washington, DC 20007, USA.

Science, **214**, 193 (9 Oct., 1981)

R81B407. Human brain protein phosphorylation in vitro: Cyclic AMP stimulation of electrophoretically separated substrates.

A. Routtenberg, D. G. Morghan, R. G. Conway, M. J. Schmidt & B. Ghetti

Cresap Neuroscience Laboratory, Northwestern University, Evanston, Illinois 60201, U.S.A.

Brain Research, **222**, 323 (19 Oct., 1981)

R81B408. Human pharmacokinetics of tolfenamic acid: A new antiinflammatory agent.

P. G. Pentikainen, P. J. Neuvonen & Backman

Department of Medicine University of Kuopio, University Central Hospital, 70210 Kuopio 21, Finland.

European J. of Clinical Pharmacology, **359** (Apr., 1981)

R81B409. Ibotenic acid, its excretory and possibly sedative actions on the cerebral cortex.

E. Puil

Department of Pharmacology, Faculty of Medicine, The University of British Columbia, Vancouver, BC, Canada V6T 1W5.

Canadian J. of Physiology and Pharmacology, **59**, 1025 (Sep., 1981)

R81B410. Influence of brain gabaergic system on eating behaviour induced by tail pinching in the rat.

B. Bereksi, J. C. Guillard, P. Noirot, Boggio, G. Mack & J. Klepping

Laboratoires de Physiologie de la Faculté de Médecine et de l'ENS BANA, Dijon Campus Universitaire, Montbard, 21000 Dijon.

Comptes Rendus des Séances de la Société Biologie et de ses filiales, **175**, 323 (Nov. 1981)

1B411. Influence of central cholytics on the effect of electroacupuncture.

V. Yasnetsov, M. V. Komendantova
V. A. Pravdivtsev

Pharmacology and Toxicology, **44**, 297 (No. 1981)

81B412. Influence of clonidine on the acute tolerance pattern to morphine induced analgesia and sensitivity changes in mice.

R. Ramaswamy, N. Padmanabha-Pillai,
S. Gopalkrishnan & M. N. Ghosh

Department of Pharmacology, Jawaharlal
Nehru Institute of Post-Graduate Medical
Education and Research, Pondicherry
605 006.

Life Sciences, **28**, 2237 (18 May, 1981)

R81B413. Influence of naxolone and methysergide on the analgesic effect of clomipramine in rats.

A. Eschalier, J. L. Montastruc, J. L.
Devoize, F. Rigal, G. Gaillard-Plaza &
J. C. Pechadre

Laboratoire de Pharmacologie Medicale,
Inserm U 195, Faculte de Medicine, 63001
Clermont Ferrand, Cedex, France.

European J. of Pharmacology, **74**, 1 (27
Aug., 1981)

R81B414. Influence of two non-steroidal anti-inflammatory drugs on lipolysis and on plasma post-heparin lipoprotein lipase activity in normal man.

D. Bonfiglioli, D. Sommariva, L. Zana-
boni, P. Scarpellini, A. Bott, U. Raggi &
A. Fasoli

Cattedra di Terapia Medica Sistemica,
Universita di Milano, L. Saccoospedale,
Milano-Vialba, Italia.

European J. of Clinical Pharmacology, **20**,
263 (No. 4, 1981)

R81B415. Inhibition of basophil histamine release by antiinflammatory steroids.

R. P. Schleimer, L. M. Lichtenstein &
E. Gillespie

Department of Medicine, Division of Cli-
nical Immunology, Johns Hopkins Uni-
versity School of Medicine at the Good
Samaritan Hospital, Baltimore, Maryland
21239, U.S.A.

Nature, **292**, 454 (30 Jul., 1981)

R81B416. Inhibitory actions of amino acids in the preoptic anterior hypothalamus of the rat.

M. L. Mayer

Department of Pharmacology, University
of Texas Medical Branch, Galveston, TX
77550, U.S.A.

Experimental Brain Research, **43**, 154 (Jul.
1981)

R81B417. Moving background patterns reveal double opponency of directionally specific pigeon tectal neurons.

B. J. Frost, P. L. Seilley & S. C. P. Wong

Department of Psychology, Queen's University, Kingston, Ontario, K7L 3N6, Canada.

Experimental Brain Research, **43**, 173 (Jul., 1981)

R81B418. Multiple opiate receptors. Alcohol selectively inhibits binding to delta receptors.

J. M. Hiller, L. M. Angel & E. J. Simon

Department of Psychiatry and Pharmacology, New York University Medical Center, New York-10016, U.S.A.

Science, **214**, 468 (23 Oct., 1981)

C CARDIOVASCULAR SYSTEM

R81C167. Acute effects of a new vasodilator R012-4713, on blood pressure, plasma renin activity, aldosterone and catecholamine levels, and renal function in hypertensive and normal subjects.

M. Grimin, P. Weidmann* A. Meier, W. J. Ziegler, & F. C. Reubi

Medizinische Universit Spoliklinik, Freiburger strasse 3 CH-3010 Berne, Switzerland.

European J. of Clinical Pharmacology, **20**, 69 (No. 3, 1981)

R81C168. Acute effects of acebutolol on cardiovascular function in man.

J. S. Dalal, P. J. Ross, K. Wong, D. J. Sheridan, M. S. T. Ruttle, M. J. Lewis & A. H. Henderson.

Departments of Cardiology and Pharmacology, Welsh National School of Medicine, Heath Park, Cardiff.

British J. of Clinical Pharmacology, **11**, 265, (Mar., 1981)

R81C169. Adrenaline activation of phosphofructokinase in rat heart mediated by α -receptor mechanism independent of cyclic A.M.P.

M. G. Clark & G. S. Patten.

Commonwealth Scientific and Industrial Research Organization, Division of Human Nutrition, Kintore Avenue, Adelaide South Australia 5000. Australia.

Nature, **292**, 461, (30 Jul., 1981)

R81C170. Adrenergic beta receptor blockade: Hemodynamic importance of intrinsic sympathomimetic activity at rest.

T. L. Svendsen, O. J. Hartling, J. Jensen, A-Mc Cair & J. Bliddal.

Department of Internal Medicine, Bispebjerg Hospital, Bispebjerg Bakke 8 DK-2400 Copenhagen NV, Denmark

Clinical Pharmacology and Therapeutics, **31**, 711, (Jun., 1981)

C171. Amrinone, isoproterenol quabain modification of cardiac contracture.

S. Gaide, S. P. Baker, A. M. Ezrin, Gelband & A. L. Bassett

Department of Pharmacology, University of Miami School of Medicine, Miami, Florida, 33101, U.S.A.

European J. of Pharmacology, **73**, 253 (Aug., 1981)

C172. Antihypertensive and hemodynamic effects of single oral doses of captopril and nifedipine in essential hypertension.

E. Soto, M. Thibonnier*, Osire, J. Bernard, P. Corvol & P. Milliez.

N. S. F. R. M. 3617, rue du fer à cheval F-75005 Paris, France.

European J. of clinical Pharmacology, **20**, 7 (No. 3, 1981)

C173. Alcohol-induced hypertension.

B. Saunderr, D. G. Beevers & A. Paton
Liver unit, Kings College Hospital, London.

The Lancet, **2**, 653 (26 Sep., 1981)

C174. Bioavailability of quinidine in congestive heart failure.

T. Ueda and B. S. Dzindzon

Department of Pharmaceutics Cardiovascular Center, The University of Nebraska 68105.

British J. of Clinical Pharmacology, **11**, 571 (Jan., 1981)

R81C175. Cardiovascular effects of cimetidine.

H. Kato, J. Kurihara, & Y. Kasuga.

Department of Pharmacology, Faculty of Pharmaceutical Sciences, Teikyo University, Sagamiko-cho, Kanagawa-Ken 199-01, Japan.

Archives Internationales De Pharmacodynamie et de Therapie, **249**, 247, (Feb., 1981)

R81C176. The cardiovascular effects of trimazosin.

J. W. Constantine & H. J. Hess

Department of Pharmacology, Pfizer, Inc, Eastern Point road, Croton, CT 06340, U.S.A.

European J. of Pharmacology, **74**, 227 (11 Sep., 1981)

R81C177. Cellular mechanisms for cardiac arrhythmias.

B. F. Hoffman & M. R. Rosen.

Department of Pharmacology, College of Physicians and Surgeons, 630 West 168th Street, New York, N. Y. 10032, U.S.A.

Circulation Research, **49**, 1, (Jul., 1981)

R81C178. Changes in the toxicity of some cardiovascular agents under the effect of hyperbaric oxygenation.

K. M. Reznikov.†

Pharmacology and Toxicology, **44**, 342 (No. 3, 1981)

†Address not available.

R81C179. Characterization of a new oral antiarrhythmic drug, fleainide.

J. C. Cowan & E. M. V. Willions*.

Department of Pharmacology, South Parks road, Oxford University, Oxford, OX1 30T, U.K.

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Department of Medical Genetics, Medical
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University Department of Medicine,
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Centre Hospitalier, Universitaire, Sher-
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P. A. Marks

Memorial Sloan—Kettering Cancer Center
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Laboratoire de Pharmacodynamie, CNRSERA 787 and INSERM 4243 University Louis Pasteur, 3P. 10, 67048 Strasbourg, France.

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J. McAfee

Chairman and Chief Executive Officer
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K. McPhun

Lecturer, Department of Engineering,
University of Warwick, Coventry CV4
7AL.

J. of Medical Engineering and Technology, **5**,
(Mar., 1981)

M135. Harvey cushing as clinical investigator and laboratory worker.

P. Christy

Department of Medicine, the College of
Physicians and Surgeons, Columbia Uni-
versity and the Medical Service, The
Roosevelt Hospital, New York, New
York, U.S.A.

American J. of the Medical Science, **281**, 79
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I. A. Foley

University of California, San Francisco,
School of Medicine, Health Policy Pro-
gramme, Washington, DC 20007, U.S.A.

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S. M. Glick

Ben-Gurion University of the Negev
Health Science Center, Soroka Medical
Center, Beer Sheva, Israel.

New England J. of Medicine, **304**, 1036 (23
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D. R. Gewert, S. Shah & M. J. Clemers

Department of Biochemistry, St. Georges'
Hospital Medical School, Cranmer Terrace,
Tooting, London, Great Britain, SW1
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S. J. Kolner

Library of the Health Sciences, Rockford
School of Medicine, University of Illinois,
Rockford, Illinois, U.S.A.

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K. T. Evans

Warden of the Royal College of Radio-
logists, Department of Diagnostic Radio-
logy, The Welsh National School of
Medicine, Health Park, Cardiff CF14
4XN, U.K.

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N NEW TECHNIQUES

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T. C. Fu & W. L. Dewey

Department of Pharmacology, Medical College of Virginia, MCV Station, Bo 613, Richmond, Virginia-23298, U.S.A.

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J. Brennan

Department of Chemistry, UMIST, P.O. Box 88, Manchester M 60 1QD.

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G. B. Patel & B. J. Agnew

Division of Biological Sciences, National Research Council of Canada, Ottawa Ont, Canada K1A0R 6.

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G. Stickrod, T. Ebaugh & C. Garnett

University of Oregon, Department of Psychology, Eugene, OR 97403 (Stickrod Ebaugh).

Laboratory Animal Science, **31**, 87 (Feb 1981)

Q POLYMERS

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Rolf Applo & Ernst Hiestler

Anorganisch - Chemisches Institut der Universität Bonn, Gerhard-Domagk-Str 1, D-5300 Bonn 1.

Chemische Berichte, **114**, 2649 (Jul., 1981)

R APPLIED MICROBIOLOGY

R81R055. Automated fermentation equipment I. Program-controlled fermentor.

A. Veres, L. Nyeste, I. Kurucz, L. Kirchnopt, L. Szigeti & J. Hollo

University of Technical Sciences, Budapest Institute of Agricultural Chemical Technology, 1521 Budapest, Hungary.

Biotechnology and Bioengineering, **23**, 392 (Feb., 1981)

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Nyeste, L. Szigeti, A. Veres, E. Pungor, I. Kurucz & J. Hollo

University of Technical Sciences, Budapest
Institute of Agricultural Chemical Technology, 1521 Budapest, Hungary.

Biotechnology and Bioengineering, **23**, 405 (Feb., 1981)

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D. P. Chynoweth, V. J. Srivastava, D. E. Berger & P. B. Tarman

Institute of Gas Technology, Chicago, Illinois 60616, U.S.A.

Chemical Engineering Progress, **77**, 48 (Jun., 1981)

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R. W. Szetela & T. Z. Winnicki

Institute of Environment Protection Engineering, Technical University of Wroclaw, pl. Grunwaldzki 950-370 Wroclaw, Poland.

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M. Shoda Y. Ishikawa

Faculty of Agriculture, Nagoya University, Nagoya, Japan.

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W. G. Choi, S. B. Lee & D. D. Y. Ryu

The Korea Advanced Institute of Science, P. O. Box 150, Chong-Ryang-Re, Seoul, Korea.

Biotechnology and Bioengineering, **23**, 361 (Feb., 1981)

R81R061. Chemically modified teflon wall coated open tubular columns for gas chromatography.

D. Bombick & J. Di Nunzio*

Department of Chemistry, Wright State University, Dayton, Ohio 45435, USA.

Chromatographia, **14**, 19 (Jun., 1981)

R81R062. Comparison of dynamic oxygen electrode methods for the measurement of KLa.

G. Ruchti, I. J. Dunn & J. R. Bourne

Chemical Engineering Laboratory (TCL), Swiss Federal Institute of Technology (ETH), CH-8092 Zurich, Switzerland.

Biotechnology and Bioengineering, **23**, 277 (Feb., 1981)

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G. Quicker, A. Schumpe, B. Konig & W. D. Deckwer

Institut für Technische Chemie, Universität Hannover, Callinstr. 3, D-3000 Hannover, 1, Federal Republic of Germany.

Biotechnology and Bioengineering, **23**, 635 (Mar., 1981)

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T. Takamatsu, S. Shioya & Okuda

Department of Chemical Engineering, Kyoto University, Kyoto 606.

J. of Fermentation Technology, **59**, 131 (1981)

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H. Sawada, S. Kinoshita, T. Yoshida, & N. Taguchi

Department of Fermentation Technology, Faculty of Engineering, Osaka University, Yamada-KamiSuita-shi, Osaka 565, Japan.

J. of Fermentation Technology, **59**, 111 (1981)

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D. N. Bull & M. D. Young

New Brunswick Scientific Co., Edison New Jersey 08817, U.S.A.

Biotechnology and Bioengineering, **23**, 3 (Feb., 1981)

R81R067. Enzymatic hydrolysis of cellulose to glucose using immobilized—glucosidase.

D. W. Sundstrom, H. E. Klei, R. V. Coughlin, G. J. Biederman, & C. Brouwer

Department of Chemical Engineering, The University of Connecticut, Storrs Connecticut 06268, U.S.A.

Biotechnology and Bioengineering, **23**, 4 (Mar., 1981)

R81R068. Enzyme activity maintenance in packed bed reactors via continuous enzyme addition.

F. H. Verhoff & S. T. Schlager

Department of Chemical Engineering, West Virginia University, Morgantown West Virginia 26506, U.S.A.

Biotechnology and Bioengineering, **23**, (Jan., 1981)

FORTHCOMING MEETINGS

International Symposium on Recent
Advances in Fertility.

Buenos Aires, Argentina—6-9 Dec., 1981

Secretariat, Instituto Bioquimicas,
UNS-CONICET, Anexo Gorriti 43,
Bahia Blanca, Argentina.

Regional Seminar on Health for All-A
Regional Dialogue on Operational Aspects
Comprehensive Primary Health Care
Rural Development.

Gwalior, 12-13 Dec., 1981.

Birla Institute of Medical Research,
Gwalior.

International Conference on the Applica-
tions of Mossbauer Effect.

Jaipur, 14-18 Dec., 1981.

Jaipur (Indian National Science
Academy.)

Symposia on Nutrition & Environment
and Current Concepts in Membrane Bio-
chemistry.

Calcutta, 21-24 Dec., 1981.

Department of Biochemistry, Univer-
sity College of Sciences,
Calcutta.

30th Annual Conference of the Anato-
mical Society of India.

Bhopal, 28-30 Dec., 1981.

Gandhi Medical College, Bhopal.

Meeting of the Society for Experimental
Biology (incl. Meiosis & Oogenesis)

Leicester, UK—5-7 Jan., 1982.

Dr. G. Shelton,
School of Biological Sciences,
University of East Anglia,
Norwich NR4 7TJ, U.K.

International Workshop on Nutrition and
the Development of the Child.

Baroda, 8-15 Jan., 1982.

Department of Biochemistry, M. S.
University, Baroda,
Baroda.

World Poultry Science Association:
Reproductive Physiology of the Domestic
Fowl.

Cambridge, U.K.—16-18, Jan., 1982

Mrs. K. Bour,
9, Colne Road, Bluntisham,
Huntingdon, PE17 3LU, U.K.

3rd International Symposium on Equine
Reproduction.

Sydney, Australia—25-29 Jan., 1982)

P. D. Rosedale,
Beaufort Cottage Stables,
High Street, Newmarket,
Suffolk, U.K.

Workshop on Evaluation of Mutagenic
Potential of Environmental Agents:
Microbial and Mammalian Systems.

Bombay, 15-19 Feb., 1982.

Division of Biochemistry and Food
Technology, Bhabha Atomic Research
Centre, Bombay (Environmental
Mutagen Society of India).

Annual Meeting of the British Society of
Animal Production.

Harrogate, UK—Mar., 1982.

Dr. F. K. Deeble,
Block A, Govt. Building,
Coley Park, Reading RG1 60T, U.K.

Annual Meeting of American Fertility
Society.

Las Vegas, US—21-25 Mar., 1982

Dr. H. H. Thomas,
1608 Leth Avenue, Suite 101,
Birmingham, AL 35205, U.S.A.

International Conference on Integrative
Neurohumoral Mechanisms.

Budapest, Hungary—24-27 Mar., 1982

Dr. E. Endroczi,
Postgraduate Medical School
1389 Budapest, Hungary.

Meeting of American College of Obstet-
ricians and Gynecologists.

Dallas, US—26-29 Ap., 1982

W. H. McDannel,
1E Wacker Drive,
Chicago, IL 60601, U.S.A.

5th International Symposium on Im-
munology of Reproduction.

Varna, Bulgaria—27-29 May., 1982.

Secretariat,
Institute of Biology and Immunol-
ogy of Reproduction,
73, Lenin Avenue,
Sofia 1113, Bulgaria.

Meeting of the Endocrine Society.

San Francisco, US—16-18 Jun., 1982.

Ms Nettie Karpin, 9650 Rockv-
ille Pike, Bethesda, MD 20014, U.S.A.

3rd International Symposium of Psych-
oneuroendocrinology in Reproduction.

Spoleto, Italy—Jul., 1982.

Prof. L. Zichella,
Institute of Clinical Obstetrics,
University of Rome,
Italy.

Annual Conference of Society for
Study of Fertility.

Nottingham, UK—6-9 Jul., 1982.

S.S.F. Business Office,
141 Newmarket Road,
Cambridge CB5 8HA, U.K.

Annual Ovarian Workshop.

Madison, US—17-19 Jul., 1982

Dr. G. S. Greenwald,
Dept. of Physiology,
University of Kansas Medical Centre,
Kansas City, KS 66103, U.S.A.

European Congress on Cell Biology.

Paris, France—19-24 Jul., 1982

CFBC, 67 rue Maurice Gunsbourg
94200 Ivry sur Seine, France.

International Theriological Conference.

Helsinki, Finland—16-20 Aug., 1982

The Secretariat,
ITC III,
University of Helsinki, Hallituskatu
8, 00100 Helsinki 10, Finland.

Meeting of British Society for Developmental Biology: Differentiation of Germ Cell Lines.

London, UK—31 Aug., 3 Sep., 1982

Dr. C. C. Wylie,
Dept. of Anatomy,
St. Georges Hospital Medical School,
Cranmer Terrace,
London SW 17, U.K.

International Workshop on Pituitary Hyperfunction.

Milan, Italy—9-11 Sep., 1982

Dr. D. Cocchi,
Dept. of Pharmacology,
University of Milan,
Via Vanvitelli 32, 20129 Milan,
Italy.

International Symposium on Abortion:
Spontaneous and Induced.

Maui, Hawaii—11-15 Oct., 1982

ESE Hafez,
Dept. of Gynecology/Obstetrics,
Wayne State University School of
Medicine,
550 E Canfield, Detroit, MI 48201,
U.S.A.

International Symposium on Contraceptive Delivery Systems.

Maui, Hawaii—12-15 Oct., 1982

ESE Hafez,
Dept. of Gynecology/Obstetrics,
Wayne State University School of
Medicine,
550 E Canfield, Detroit, MI 48201,
U.S.A.

Annual Meeting of Central Association
of Obstetricians & Gynecologists.

San Antonio, US—14-16 Oct., 1982

Dr. G. D. Malkasian Jr.,
Mayo Clinic,
200 First Street, Rochester,
MD 55901, U.S.A.

10th World Congress of Gynecology &
Obstetrics.

San Francisco, US—17-22 Oct., 1982

American College of Obstetricians
and Gynecologists,
1 E. Wacker Drive, Suite 2700,
Chicago, IL 60601, USA.

10th International Congress for Animal
Reproduction and Artificial Insemina-
tion.

Urbana, US—3-8 Jun., 1983

Prof. W. G. Wagner,
Dept. of Veterinary Biosciences,
University of Illinois,
1101 W Peabody Drive, Urbana,
IL 61801,
U.S.A.

TRAINING COURSES

NIOH/WHO Training Course on A
Pollution and Health: Ahmedabad
1-10 Dec., 1981.

At the National Institute of Occupational
Health, Ahmedabad.

Certificate Course in Statistical Techniq
in Medical Research.

New Delhi, Jan., 1982.*

At the Institute for Research in Medic
Statistics, New Delhi.

*Date to be announced later.

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ENDOCRINE SYSTEM

81A391. An alkaline metallo-proteinase in the human uterine cervix and changes in its activity by cervical ripening.

Ito, K Kitamura, S. Hirakawa & Mori.

Chimica et Biophysica Acta (E), **661**, 267, (3 Oct, 1981)

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Djoseland*, S. Hoglo, T. Abyholm, H. N. Haugen.

Endokrinologisk Laborat Irium, Med. Avd., Rikshospitalit, Oslo, Norway.
Archives of Andrology, **6**, 229, (May, 1981)

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T. M. Vreeburg, P. J. A. Woutersem, I. P. Ooms & J. J. V. Bosch.

Department of Endocrinology, Growth and Reproduction, Faculty of Medicine, Erasmus University, Rotterdam. The Netherlands.

Journal of Endocrinology, **88**, 9 (Jan., 1981)

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J. Hermanns & E. S.E. Hafez*.

Department of Gynaecology/Obstetrics, Wayne State University School of Medicine, Rm 416, Medical Research Bldg., 550 E Canfield, Detroit, MI 48201 U.S.A.
Archives of Andrology, **6**, 189, (May, 1981)

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I. Kraulis, S. J. Naish, D. Gravenor & K. B. Ruf*.

Royal Victoria Hospital, 687 Pine Avenue West, Montreal, Quebec H3A1A1.

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S. Panyim.

Department of Biochemistry, Faculty of Science, Mahidol University, Bangkok, Thailand.

Andrologia, **13**, 322, (Jul.-Aug., 1981)

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E. W. Radany, R. W. Atherton & I. T. Forrester.

Department of Zoology-Physiology, University of Wyoming, Laramie, Wyoming 82070.

Archives of Biochemistry and Biophysics, **210**, 770 (Sep, 1981)

B NERVOUS SYSTEM

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R. G. Hammouds, Jr., N. Ling & D. Puetti*

Department of Biochemistry, 555 Light Hall, Vanderbilt University, Nashville, Tenn 37232, U.S.A.

Analytical Biochemistry, **114**, 75 (1 Jun., 1981)

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S. Kanoh & Y. Ogawa

Department of Pharmacology, National Institute of Hygienic Sciences, Osaka Branch, Osaka 540, Japan.

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E. Schoffeniels & D. G. Margineanu

Department of General and Comparative Biochemistry, University of Liege, 17, Place Delcour, B-4020 Leige, Belgium.

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W. R. Buckett

Centre de Recherche Merrell International, 16 rue d' Ankara, 67084, Strasbourg, Cedex, France.

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N. B. Shepperson, T. Purull, R. Massingham & S. Z. Langer*

Department of Biology, Laboratoires Etudes de Recherches Synthelabo, 58, de la Glaciere, F-75013, Paris, France.

Archives of Pharmacology, **317**, 1 (Aug., 1981)

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S. Algeri, M. Allstein, G. M. De Simoni & V. Guardabasso

Mario Negri, Institute for Pharmacological Research, Via Eritrea 62, 20133 Milano, Italy.

European J. of Pharmacology, **74**, 261 (Sep., 1981)

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V. Canzok, M. Wolfensberger, U. Ammann & M. Cuenod

Brain Research Institute, University of Zurich, August Forel-Strasse 1, CH-8001 Zurich, Switzerland.

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on batrachotoxin-activated
sodium channel.

M. Muang & G. Ehrenstein

Laboratory of Biophysics, National Institute
 of Neurological and Communicative
 Disorders and Stroke, National Institute
 of Health, Bethesda, Maryland 20205,
 A.

Journal of General Physiology, **77**, 137 (Feb.,
 1981)

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relevant to anaesthesia.

P. Franks & W. R. Lieb

Physics Section, Department of Physics,
 Imperial College of Science and Techno-
 logy, Prince Consort Road, London SW7
 2BZ, U.K.

Nature, **292**, 248 (16 Jul., 1981)

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the central properties of Gly-His-
tydine are not due to release of am-
phetamine.

M. Morier, R. Rips, C. Jacqnot, J. Rapin

Unité de Pharmacologie Clinique de L'
 I.S.E.R.M. 17, rue du fer à Moulin,
 75005, Paris, France.

European Journal of Medicinal Chemistry, **16**, 271
 (May-Jun., 1981)

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anti-epileptic drugs.

J. Milligan & A. Richens

Clinical Pharmacology Unit, Institute of
 Neurology, Queen Square, London WC1,
 U.K.

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anti-depressant drugs.

G. Fillion & M. P. Fillion

Laboratory of Pharmacology, Pasteur
 Institute, F-75-724, Paris, Cedex 15,
 France.

Nature, **292**, 349 (23 Jul., 1981)

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the isolated brain enzyme 2', 3' cyclic
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H. W. Muller, P. A. Clapshaw & W.
 Seifert

Friedrich Miescher Laboratorium der
 Max Planck-Gesellschaft, Spemannstrasse
 37-39, D-7400 Tübingen, Federal Republic
 of Germany.

FEBS Letters, **131**, 37 (17 Aug., 1981)

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J. P. Horn & J. Dodd

Department of Neurobiology, Harvard
 Medical School, 25 Shattuck Street, Bos-
 ton, Massachusetts 02114, USA.

Nature, **292**, 625 (13 Aug., 1981)

C CARDIOVASCULAR SYSTEM

R81C186. The effect of age on digitoxin pharmacokinetics.

M. A. Donovan*, C. M. Castledin, J. E. F. Pohl and C. A. Kraft.

Department of Medicine, Ciolway Regional Hospital, Galway, Ireland.

British J. of Clinical Pharmacology, **11**, 401 (Apr., 1981)

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S. Saltissi and A. Crowther

Department of Cardiology, St., Thomas Hospital, London.

British J. of Clinical Pharmacology, **11**, 497 (May, 1981)

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H. J. Jiirgensen, J. D. Nielsen, E. Kjller, & J. Gormsen.

Medical Department B, Frederiksborg anits sygehus, DK-3400 Hillerod, Denmark.

European J. of Clinical Pharmacology, **20**, 245 (No. 4, 1981)

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M. Segal

Psychiatry Research Laboratory, Department of Psychiatry Madasseh Medical Organization, P. O. Box 12000, 91 Jerusalem, Israel.

Experientia, **37**, 298, (15 Mar., 1981)

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S. D. Seth, M. P. Gupta, A. H. Kaur, A. K. Basu

Department of Pharmacology and Nuclear Medicine, All India Institute of Medical Sciences, New Delhi-110029.

Indian J. of Experimental Biology, **19**, No. 782 (Aug., 1981)

R81C191. Effect of anesthesia on canine carotid chemoreceptor reflex.

M. Zimpfer, S. P. Sit, & S. F. Catner*

New England Regional Primate Research Centre, One Pine Mill Drive, Southboro, Massachusetts, 01776, U S.A.

Circulation Research, **48**, 400 (Mar., 1981)

R81C192. Effect of Captopril on blood pressure electrolytes, and certain hormones in hypertension.

L. Guillevin, M. D. Lardoux & p. Corv

Hospital Avicenne, 125 route de Stalingrad, 93000 Bobigny, France.

Clinical Pharmacology and Therapeutics, **2**, 699 (Jun., 1981)

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Palik, P. Hadhazy, K. Magyar, B. Koml6czy, M. Wagner & G. Pogatsa

National Institute of Cardiology, Research Institute and Semmelweis Medical School, Department of Pharmacodynamics, P.O. Box 88, H-1450 Budapest, Hungary.

Experientia, **37**, 863 (15 Aug., 1981)

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E. ST Takala, & I. E. Massinen

Department of Medical Biochemistry, University of Oulu, Kajaanintie 52 A, SF-90220 Oulu 22, Finland.

Circulation Research, **49**, 62 (Jul., 1981)

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Kim, T. Akera & T. M. Brody

Department of Pharmacology & Toxicology, Michigan State University, East Lansing, Michigan, U.S.A.

Journal of Pharmacology & Experimental Therapeutics, **217**, 559 (Jul., 1981)

C196. Effect of YS-980, an orally active converting enzyme inhibitor on blood pressure in normotensive and hypertensive rats.

Komori & K. Yamamoto

Department of Pharmacology, Osaka city University Medical School, Abeno, Osaka 545, Japan.

Japanese J. of Pharmacology, **31**, 401 (Jun., 1981)

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M. F. Burn

Laboratory of the Howard Hughes Medical Institute, Peter Bent Brigham Hospital, Harvard Medical School, Boston, Massachusetts, 02115, U.S.A.

Blood, **58**, 189 (Aug., 1981)

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H. R. Kaplan

Warner-Lambert Parke-Davis Pharmaceutical Research Division, Ann Arbor, Michigan 48105, U.S.A.

Federation Proceedings, **40**, 2250 (Jun., 1981)

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W. Feldberg & M. Rocha E. Silva JR

National Institute for Medical Research, Mill Hill London NW7 1AA.

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S. L. Bostrom, B. Lyung, S. Mardh, S. Forsen & E. Thun

AB Hassle Research Laboratories, S. 431 83 Mopndal, Sweden.

Nature, **292**, 777 (20 Aug., 1981)

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D. Thormahlen* and O. Rohte

Abteilung fur Experimentalle forschung, Beechamwulfing, D-3212 Gronau, Federal Republic of Germany.

Archives of Pharmacology, **317**, 81 (Aug., 1981)

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J. C. Sombeng, J. E. Kuhlman & T. W. Smith

Cardiovascular Division, Albert Einstein College of Medicine, 1300 Morris Park Avenue, Bronx, New York 10461, U.S.A.

Circulation Research, **49**, 226 (Jul, 1981)

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R. C. Arora S. Arora & R. K. Gupta

Reader in Medicine and Consultant Physician, PR-13, M. L. B. Medical College Campus, Jhansi 184001.

Atherosclerosis, **40**, 175 (Oct, 1981)

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M. Voelz

Potter Building, Biomedical Engineering Centre, Purdue University, West Lafayette, Indiana 47907.

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logisch forschung mb H, Masche-
Weg 1, D-3300 Braunschweig-
heim, Federal Republic of Germany.

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elmer and M. Crabeel

oratoire de Microbiologie, Faculte des
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Thrombosis Research Centre, Temple
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Service de Biochimie, Department de Bio-
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G. L. King and C. R. Kahn

Section on Cellular and Molecular Phy-
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National Institutes of Health, Bethesda,
Maryland, 20205, USA.

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Biochemical Genetic Section, National
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Department of Pathology, University of Cambridge, Tennis Court Rd, Cambridge CB2 1QP.

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Department of Immunology, School of Medicine, Chiba University, Chiba City, Chiba 280, Japan.

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Department of Microbiology, University of Umea, S-90187 Umea, Sweden.

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Laboratory of Cell Physiology, Department of Life Chemistry, Graduate School of Nagatsuta, Tokyo Institute of Technology, Yokohama 227, Japan.

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Department of Biochemistry, and Molecular Biology, Harvard University, Cambridge, Massachusetts 02138, USA.

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IRC Laboratory of Molecular Biology, Hills Road, Cambridge CB2. 2bH, UK.

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Clinical Research Institute of Montreal, 110—Pine Avenue West, Montreal, Quebec, Canada H2W 1R7.

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Institute of Animal Physiology, Slovak Academy of Science, 90028, Ivanka pri Dunaji, Czechoslovakia.

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Department of Immunology, London Hospital Medical College, Turner Street, London E12 AD, UK.

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Department of Biochemistry, University of Helsinki, 00170 Helsinki 17, Finland.

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LUCKNOW, INDIA

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K268. A sensitive new method measurement of guanase with oguanine in bicine bis-hydroxy l glycine buffer as substrate.

O, T. Takaoka, H. Mori and A. Teruo

Department of Internal Medicine,
Shima University School of Medi-
Tokushima (770), Japan.

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**K269. Simple relationships
cerning mobile and stationary
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omatography.**

C. Hennion, C. Picard, C. Combellsa,
Caude and R. Rosset

oratoire de Chimie Analytique des
cessus Industriels, ESPCI, 10 Rue
nquelin, Paris 5eme France.

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F. Brana, A. M. Sanz, J. M. Castel-
no, C. M. Roldan, and C. Roldan

epartamento de Quimiea Organica,
eultad de Ciencias Quimicas, Univer-
y Complutense, Madrid-3, Spain

European J. of Medicinal Chemistry, **16**, 207,
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. E. K. Donaldson and E. Sayer

M. R. C. Neurological Prosthesis Unit, 1
Windsor Walk, London, SE5 8BB, Eng-
and.

*Medical and Biological Engineering and
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implementation.**

P. E. K. Donaldson and E. Sayer

MRC Neurological Prosthesis Unit, 1
Windsor Walk, London SE5 8BB,
England.

*Medical and Biological Engineering and Com-
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saliva.**

K. T. Izutsu

Department of Oral Biology and The
Center for Research in Oral Biology,
School of Dentistry, University of
Washington, Seattle, Washington 98195,
U.S.A.

J. of Theoretical Biology, **90**, 397, (Jun.,
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New York Medical College, New York,
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University of Vermont, Burlington, VT
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Specialized Center for Thrombosis Research
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C. S. Wood

William S. Wood and Assoc, West Ches-
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P. Kuimova & V. S. Sonia

Institute of Microbiology, USSR Academy of Sciences, Moscow, USSR.

Industan Antibiotics Bulletin, **23**, 1 (1981)

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K. Hayashi, A. Scino, T. Kasumi, N. Kubo & N. Tsumura

National Food Research Institute, Ministry of Agriculture, Forestry and Fisheries, Kannondai, Yatabe-machi, Tsukuba gun, Ibaraki 305, Japan.

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R81R106. Use of immobilized cells of *Rhizopus nigricans* for the 11-hydroxylation of progesterone.

I. S. Maddox, P. Dunnill & M. D. Lilly

Biotechnology Department, Massey University, Palmerston North, Newzealand.

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FORTHCOMING MEETINGS

International Symposium on Recent
Advances in Fertility.

Buenos Aires, Argentina—6-9 Dec., 1981

Secretariat, Instituto Bioquimicas,
UNS-CONICET, Anexo Gorriti 43,
Bahia Blanca, Argentina.

National Seminar on Health for All-A
National Dialogue on Operational Aspects
of Comprehensive Primary Health Care
and Rural Development.

Gwalior, 12-13 Dec., 1981.

Birla Institute of Medical Research,
Gwalior.

International Conference on the Applica-
tions of Mossbauer Effect.

Jaipur, 14-18 Dec., 1981.

Jaipur (Indian National Science
Academy.)

Symposia on Nutrition & Environment
and Current Concepts in Membrane Bio-
chemistry.

Calcutta, 21-24 Dec., 1981.

Department of Biochemistry, Univer-
sity College of Sciences,
Calcutta.

30th Annual Conference of the Ana-
tomical Society of India.

Bhopal, 28-30 Dec., 1981.

Gandhi Medical College, Bhopal.

Meeting of the Society for Experimental
Biology (incl. Meiosis & Oogenesis)

Leicester, UK—5-7 Jan., 1982.

Dr. G. Shelton,
School of Biological Sciences,
University of East Anglia,
Norwich NR4 7TJ, U.K.

International Workshop on Nutrition and
the Development of the Child.

Baroda, 8-15 Jan., 1982.

Department of Biochemistry, M. S.
University, Baroda,
Baroda.

World Poultry Science Association
Reproductive Physiology of the Domestic
Fowl.

Cambridge, U.K.—16-18, Jan., 1982

Mrs. K. Bour,
9, Colne Road, Bluntisham,
Huntingdon, PE17 3LU, U.K.

International Symposium on Equine
reproduction

Sydney, Australia—25-29 Jan., 1982)

P. D. Rosedale,
Beaufort Cottage Stables,
High Street, Newmarket,
Suffolk, U.K.

Workshop on Evaluation of Mutagenic
Potential of Environmental Agents:
Microbial and Mammalian Systems.

Bombay, 15-19 Feb., 1982.

Division of Biochemistry and Food
Technology, Bhabha Atomic Research
Centre, Bombay (Environmental
Mutagen Society of India).

Annual Meeting of the British Society of
Animal Production.

Harrogate, UK—Mar., 1982.

Dr. F. K. Deeble,
Block A, Govt. Building,
Coley Park, Reading RG1 60T, U.K.

Annual Meeting of American Fertility
Society.

Las Vegas, US—21-25 Mar., 1982

Dr. H. H. Thomas,
1608 Leth Avenue, Suite 101,
Birmingham, AL 35205, U.S.A.

International Conference on Integrative
Neuroharmonal Mechanisms.

Budapest, Hungary—24-27 Mar., 1982

Dr. E. Endroczi,
Postgraduate Medical School,
1389 Budapest, Hungary.

Meeting of American College of Obstetri-
cians and Gynecologists.

Dallas, US—26-29 Apr., 1982

W. H. McDannel,
1E Wacker Drive,
Chicago, IL 60601, U.S.A.

5th International Symposium on Immu-
nology of Reproduction.

Varna, Bulgaria—27-29 May., 1982.

Secretariat,
Institute of Biology and Immunology
of Reproduction,
73, Lenin Avenue,
Sofia 1113, Bulgaria.

Meeting of the Endocrine Society.

San Francisco, US—16-18 Jun., 1982.

Ms Nettie Karpin, 9650 Rockville
Pike, Bethesda, MD 20014, U.S.A.

3rd International Symposium of Psycho-
neuroendocrinology in Reproduction.

Spoletto, Italy—Jul., 1982.

Prof L. Zichella,
Institute of Clinical Obstetrics,
University of Rome,
Italy.

Annual Conference of Society for the
Study of Fertility.

Nottingham, UK --6-9 Jul., 1982.

S.S.F. Business Office,
141 Newmarket Road,
Cambridge CB5 8HA, U.K.

4th Annual Ovarian Workshop.

Madison, US—17-19 Jul., 1982

Dr. G. S. Greenwald,
Dept. of Physiology,
University of Kansas Medical Centre,
Kansas City, KS 66103, U.S.A.

1st European Congress on Cell Biology.

Paris, France—19-24 Jul., 1982

CFBC, 67 rue Maurice Gunsbourg
94200 Ivry sur Seine, France.

3rd International Theriological Conference.

Helsinki, Finland—16-20 Aug., 1982

The Secretariat,
ITC III,
University of Helsinki, Hallituskatu
8, 00100 Helsinki 10, Finland.

Meeting of British Society for Developmental Biology: Differentiation of Germ Cell Lines.

London, UK—31 Aug., 3 Sep., 1982

Dr. C. C. Wylie,
Dept. of Anatomy,
St Georges Hospital Medical School,
Cranmer Terrace,
London SW 17, U.K.

International Workshop on Pituitary Hyperfunction.

Milan, Italy—9-11 Sep., 1982

Dr. D. Cocchi,
Dept. of Pharmacology,
University of Milan,
Via Vanvitelli 32, 20129 Milan,
Italy.

International Symposium on Abnormal Spontaneous and Induced.

Maui, Hawaii—11-15 Oct., 1982

ESE Hafez,
Dept. of Gynecology/Obstetrics,
Wayne State University School
Medicine,
550 E Canfield, Detroit, MI 48201
U.S.A.

International Symposium on Contraceptive Delivery Systems.

Maui, Hawaii—12-15 Oct., 1982

ESE Hafez,
Dept. of Gynecology/Obstetrics,
Wayne State University School
Medicine,
550 E Canfield, Detroit, MI 48201
U.S.A.

Annual Meeting of Central Association of Obstetricians & Gynecologists.

San Antonio, US—14-16 Oct., 1982

Dr. G. D. Malkasian Jr.,
Mayo Clinic,
200 First Street, Rochester,
MD 55901, U.S.A.

10th World Congress of Gynecology & Obstetrics.

San Francisco, US—17-22 Oct., 1982

American College of Obstetricians
and Gynecologists,
1 E. Wacker Drive, Suite 2700,
Chicago, IL 60601, USA.

International Congress for Animal
Production and Artificial Insemina-

Urbana, US—3-8 Jun., 1983

Prof. W. G. Wagner,
Dept. of Veterinary Biosciences,
University of Illinois,
1101 W Peabody Drive, Urbana,
IL 61801,
U.S.A.

TRAINING COURSES

NIOH/WHO Training Course on Air
Pollution and Health: Ahmedabad.,
1-10 Dec., 1981.

At the National Institute of Occupational
Health, Ahmedabad.

Certificate Course in Statistical Techniques
in Medical Research.

New Delhi, Jan., 1982.*

At the Institute for Research in Medical
Statistics, New Delhi.

*Date to be announced later.

A BIBLIOGRAPHY*

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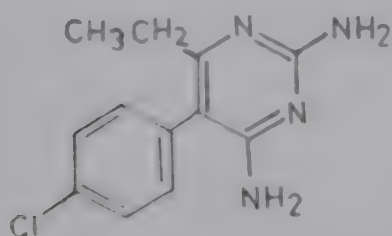
PYRIMETHAMINE - AN ANTIMALARIAL DRUG

Compiled by
Dr. A. K. Goel

PYRIMETHAMINE:

Chemical Name: 5-(4-Chlorophenyl)-6-ethyl 2, 4-pyrimidine-diamine.

Chemical Structure:



Molecular Formula: $C_{12}H_{13}ClN_4$

Molecular Weight : 248.7

Melting Point : about 240°C.

Solubility: insoluble in water, but soluble in 200 parts of alcohol and 125 parts of chloroform.

Therapeutic Category : Antimalarial.

Notes:

1. The bibliography covers literature on primaquine for period 1975-80.
2. Arrangement of the entries is in chronological order. Entries in each year have further been arranged alphabetically by name of first author.
3. The format of an entry is: name(s) of author(s), title of the article, name of the Journal, vol. no., page no., year and language. Where ever language is not indicated it only means that the article is in English.
4. Entries marked with an *asterisk*(*) indicate that the *photocopies of the original articles are available from NICDAP, Central Drug Research Institute, Lucknow.*
5. Surnames with full stop indicate that they are truncated.
6. Source publications for this bibliography are: *Science Citation Index, Chemical Abstracts, Biological Abstracts and Current Contents.*

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